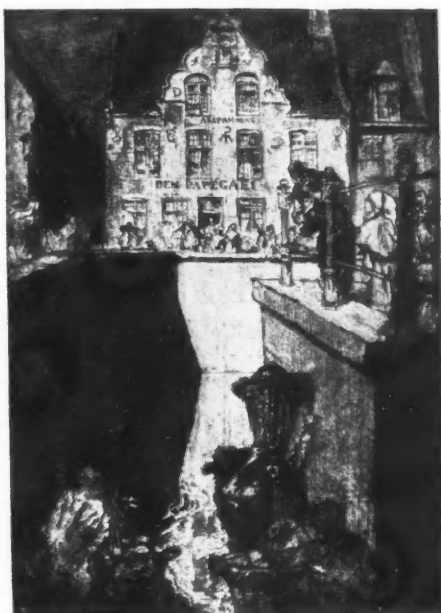


GENERAL LIBRARY  
AUG 15 1919  
UNIV. OF MICH.

*The*  
BUILDING REVIEW  
*Formerly Published as*  
*The* ARCHITECT



*August 1919 Volume XVIII Number 2*  
*Twenty five Cents*



*Painting Contractors*  
**BLISS & SCHWENZFEIER**  
 Pasadena, Cal.

**RESIDENCE OF SAMUEL S. HINDS**  
 La Loma Road, Pasadena, Cal.

*Architects*  
**MARSTON & VAN FELT**  
 Pasadena, Cal.

Finished  
 Throughout with

**Kyanize**  
 KY-AN-IZE

WHITE  
 ENAMEL

Our new books "Recent Pacific Coast Architecture" and "The Inviting Home," containing Practical Specifications, mailed on application.

**Boston Varnish Company**  
 KY-AN-IZE

San Francisco Office and Warehouse: 269 Eighth Street

A. L. GREENE, Local Manager

Portland  
 TIMMS, CRESS & CO.

Tacoma  
 W. J. HANSON & CO.

**DISTRIBUTORS:**

Vancouver, B. C.  
 BOGARDUS-WICKENS, Ltd.

Seattle  
 CAMPBELL HDWE. & PAINT CO.

Los Angeles  
 SUNSET PAINT CO.

El Paso  
 SUNSET PAINT CO.



MAN FELT  
Cal.

E  
L

CO.

CO.



217

o  
h  
th  
ti  
m  
in  
ti  
m  
o



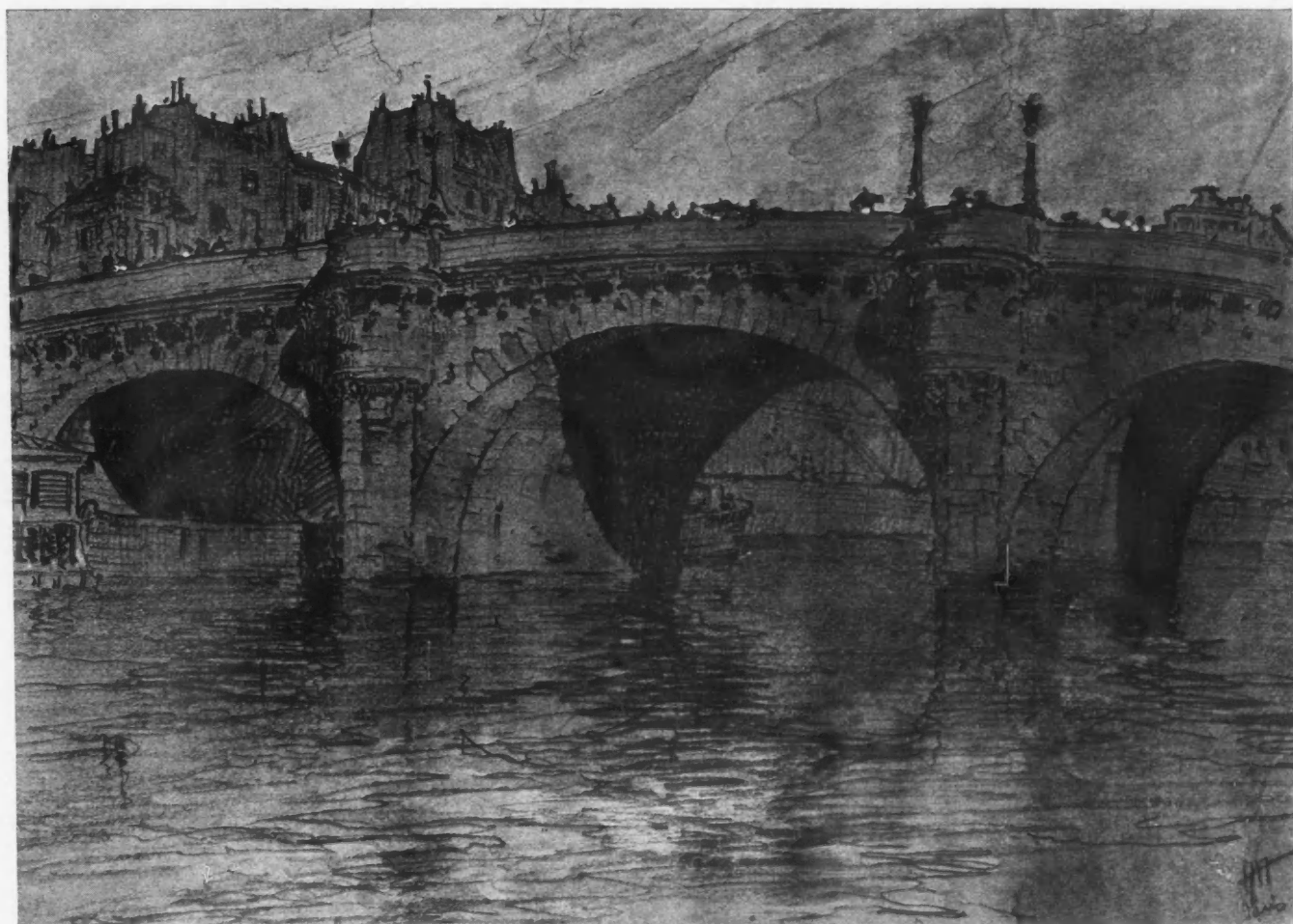
# *The* BUILDING REVIEW

VOL. XVIII

SAN FRANCISCO, AUGUST, 1919

No. 2

## *The* ARCHITECT



THE PONT NEUF, PARIS  
SKETCH BY ABE APPLETON

### SOME EUROPEAN DRAWINGS

Sketches by Abe Appleton, Architect

By IRVING F. MORROW

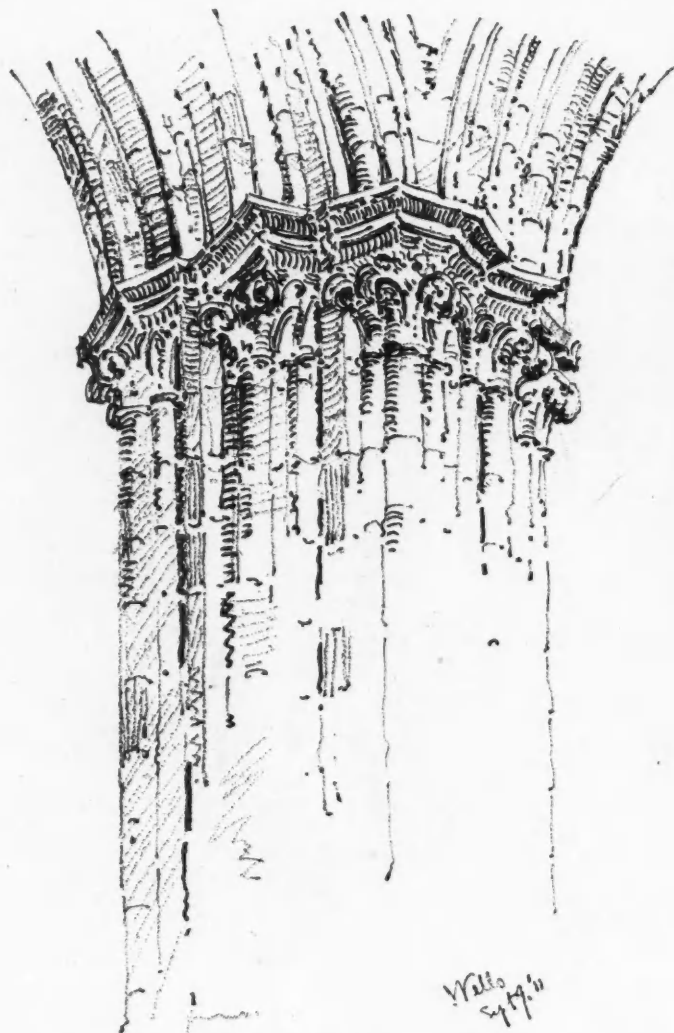
THE traveler who returns home with well-filled sketch books possesses a store of treasure for which no substitute can be supplied. He has enjoyed the zest of making drawings, and the indulgence of this pleasure has provided him with a source of ever-fresh reminders of things seen. Objects which are delineated must be scrutinized with an intentness which impresses them on the mind more vividly than can be possible from any mere inspection. But this is true not alone of those comparatively few subjects which even the most industrious draftsman can find time and opportunity to render. The quest of vital or picturesque bits becomes a habit in itself, and

the power of perceiving and appreciating beauty wherever encountered increases in scope and in sensitiveness with its continued exercise. Thus he who sketches not only finds himself in possession of a collection of tangible graphical souvenirs, but his entire vision is broadened, his observation sharpened, his receptiveness stimulated, and his joy in life by so much augmented. By the side of these advantages what counter claim can be made for the facile and ubiquitous photograph? He who runs has renounced even the attempt at reading and taken to photography. One unconsciously snaps pictures in passing, while the mind is occupied with the time of departure of the next

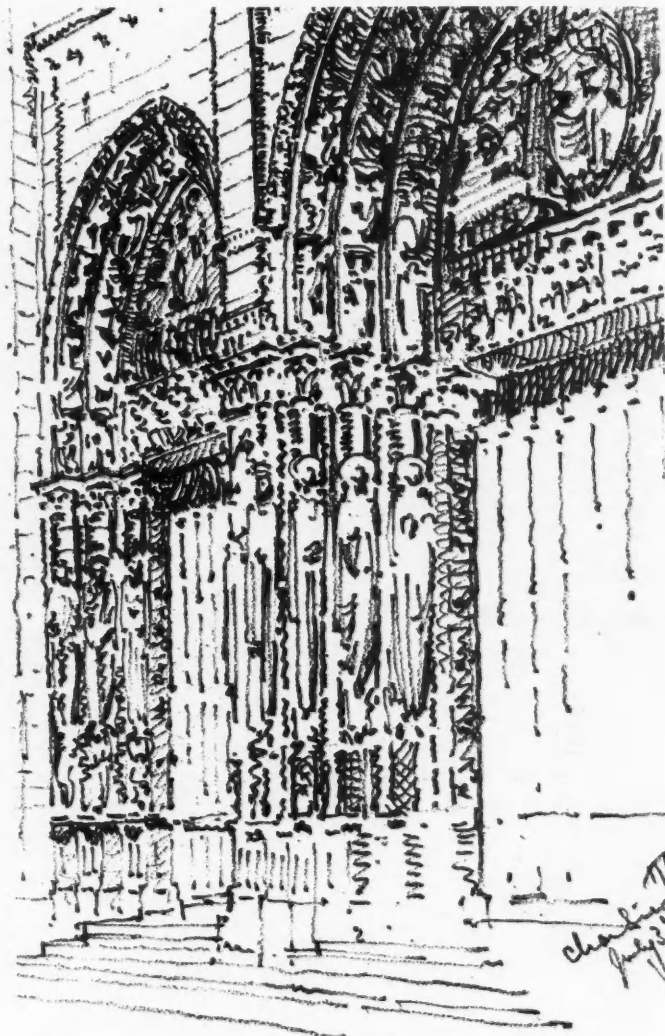
## THE BUILDING REVIEW

train. And the result is that the eye is no more seriously affected by what passes through it than is the lens of the camera itself. I have myself on more than one occasion known the humiliating experience of receiving pictures from the printer which it required a good hour of earnest thought and calculation to identify. But imagine looking over a sketch book after the lapse of whatever number of years and having to wonder where a given sketch was made, or when, or what was the name of the inn from which we sallied forth with pads and portfolio, or what

register fleeting impressions; and commonly, when this has been effected their real work has been accomplished. As promptings to subsequent recollection they may be of inestimable value to their authors, while possessing no valid claim to the outsider's attention. Yet, as also with journals and letters, there are instances where sketches assume a significant combination of content and form which broadens their audience to include all those who are interested in the creative or the contemplative mind. In these rarer cases they are among the most precious of



PIER CAPITAL, WELLS CATHEDRAL  
SKETCH BY ABE APPLETON



PORTAL, CHARTRES CATHEDRAL,  
SKETCH BY ABE APPLETON

we paid the aged care-taker for a favorable seat, or of the faces and voices of the children who peered over our shoulders and jostled our arms as we drew, or of the flowers whose odor came across the near-by garden wall! Such uncertainties, of course, are inconceivable, for these things and numberless others of their kind are of the very essence of our sketches, sometimes even more so than the particular forms of the objects depicted.

Sketch books, then, fall into the same class with private journals and intimate correspondence. In origin and purpose they are essentially subjective. They are made for personal use, without thought of ulterior audience or general appeal. They record half-glimpsed ideas or

documents, because they reveal that human essence, personality, with an ingenuous fidelity often denied to really greater and more finished art.

The sketches by Mr. Appleton here shown date from eight years back. It is because they reveal buoyancy, delicate sensibility to beauty, a clear feeling for composition both objectively in the matter depicted and subjectively in the manner of treating it, and a tantalizing facility in the handling of media, that they are deemed worthy of extended presentation. The drawings are of a type which is sometimes described as clever, or "snappy"; yet such epithets applied to them would really be unjust, because conveying so small a part of the truth. Cleverness in

## THE BUILDING REVIEW

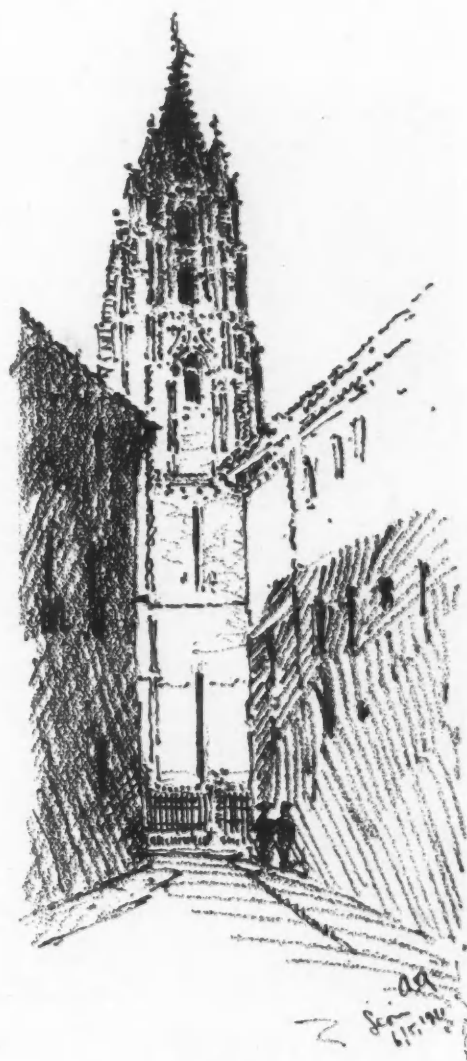
draftsmanship only too often connotes flippancy and insubstantiality. Quite on the contrary, these are of a high seriousness, irreproachably faithful to the spirit and the letter alike of their originals, yet without pedantry or dryness, full of an eager and exuberant enjoyment of the most worth-while things of life.

There are here no studio drawings. All are field sketches, made at a single sitting each, and generally with astonishing directness and rapidity. In looking at the cuts

deepest is in reality gray; the result is the introduction of an appearance of harshness or crudity foreign to the original. Finally, reduction in size induces a thickening, smudging, and disintegration in a drawing not executed with this end in view. For these reasons it may be worth while to offer a few notes on the nature of the originals of the sketches here printed. The drawings of Wells, Chartres, Burgos, and Leon (pages 22 and 23) are pencil on white paper, and are reproduced at practically the same



CATHEDRAL, BURGOS  
SKETCH BY ABE APPLETON



CATHEDRAL, LEON  
SKETCH BY ABE APPLETON

it must be remembered that all media do not emerge with unimpaired vitality from the ordeal of modern mechanical reproductive processes. In half-tone reproduction, subjects in color often suffer disintegration as a result of subtle alterations of values in photographing; drawings on a paper with a body tone undergo a darkening or lowering of contrast, resulting in a loss of atmosphere; and line work, either pencil or pen, executed in half-tone, loses piquancy and vivacity. As to subjects in pencil reproduced as line cuts, it must be recalled that in one-impression magazine work these are of necessity printed in ink of pure black, beside which the average graphite pencil at its

sizes as the originals. The Pont Neuf, Paris (page 21) is pencil on a rather dark brown board, with sky lightened by a tone of thin white gouache, and spots of color enlivening the small figures seen over the parapet; it is reproduced at about three-fourths of the size of the original. The Rouen sketch (page 24) is pencil on light brown paper, with slight additions of white and colored crayons. The sketch of Tours (page 25) is pencil on medium brown paper. The Tintern sketch (page 24) is pure water-color on white paper. All of the latter three appear reduced to about two-thirds of the size of their originals.



## THE HUMAN ELEMENT IN DESIGN

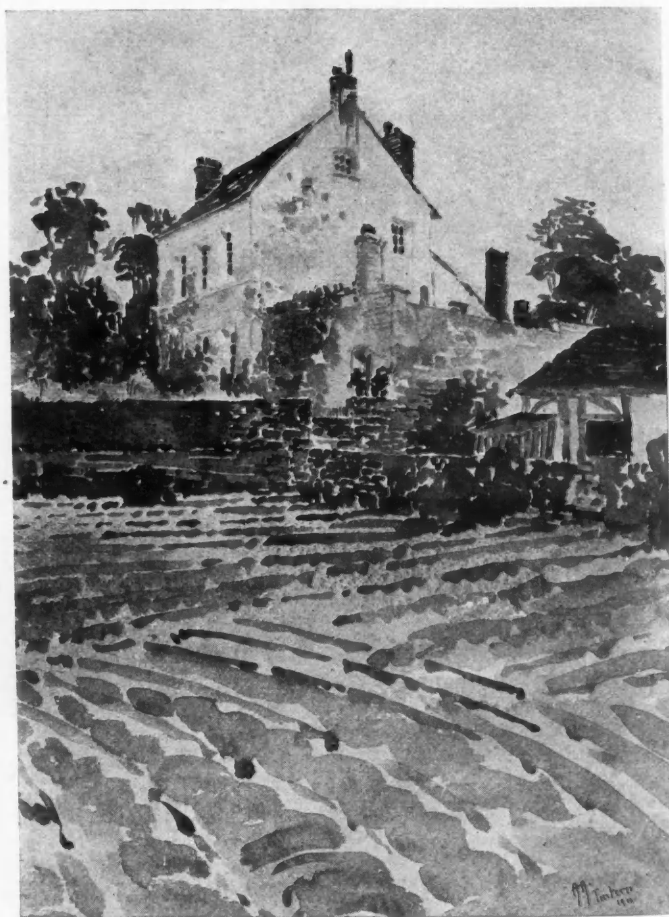
WE ONCE lived not a great distance from one of the world's most wonderful fountains. It stood at the end of a long vista of green parterre between double lines of majestic chestnut trees. In a stone-coped basin spirited bronze horses, prancing and struggling to escape the play of exuberant jets of water, surrounded a central pedestal which bore aloft sculpture calmly symbolizing the four corners of the earth. From the splashing basin the water poured into a long sunken pool, pellucid and untroubled save for the ripples from the entering flow.

of this scene. But on a certain rainy afternoon of late autumn circumstances drew us past this familiar point. It had been drizzling dimly since early morning. Everything was dank and spiritless and gray. Paths and lawns were cluttered with heaps of rain-soaked leaves. The long avenues leading to the fountain were silent save for the melancholy monotony of incessant dripping, and quite deserted save for our own solitary passing. At the fountain foolishly petulant bronze horses made futile efforts to evade sullen and meaningless streams of water. It all



STREET, ROUEN  
SKETCH BY ABE APPLETON

Sunshine played through the trees and over the green lawns, and the yellow gravel walks were dappled with restless patterns of shadow. Sunshine gleamed on the turbulent streams of water, raining now in torrents of brilliant jewels, wafting now in evanescent snatches of iridescent rainbow where a passing breeze turned the spray. Around the basin's broad stone curb, over the lawns and under the trees, sported troops of exultant children, while sedately-capped nurse-maids and governesses gossiped or dozed on the benches in the shade. Students, more restrained yet buoyant, strolled in groups up and down the straight, clean avenues. Casual passers-by came and went with preoccupied airs. It was all magnificent, superb, throbbing with irresistible life. Many a time we indulged in a detour out of our real way for the sake of a simple glimpse



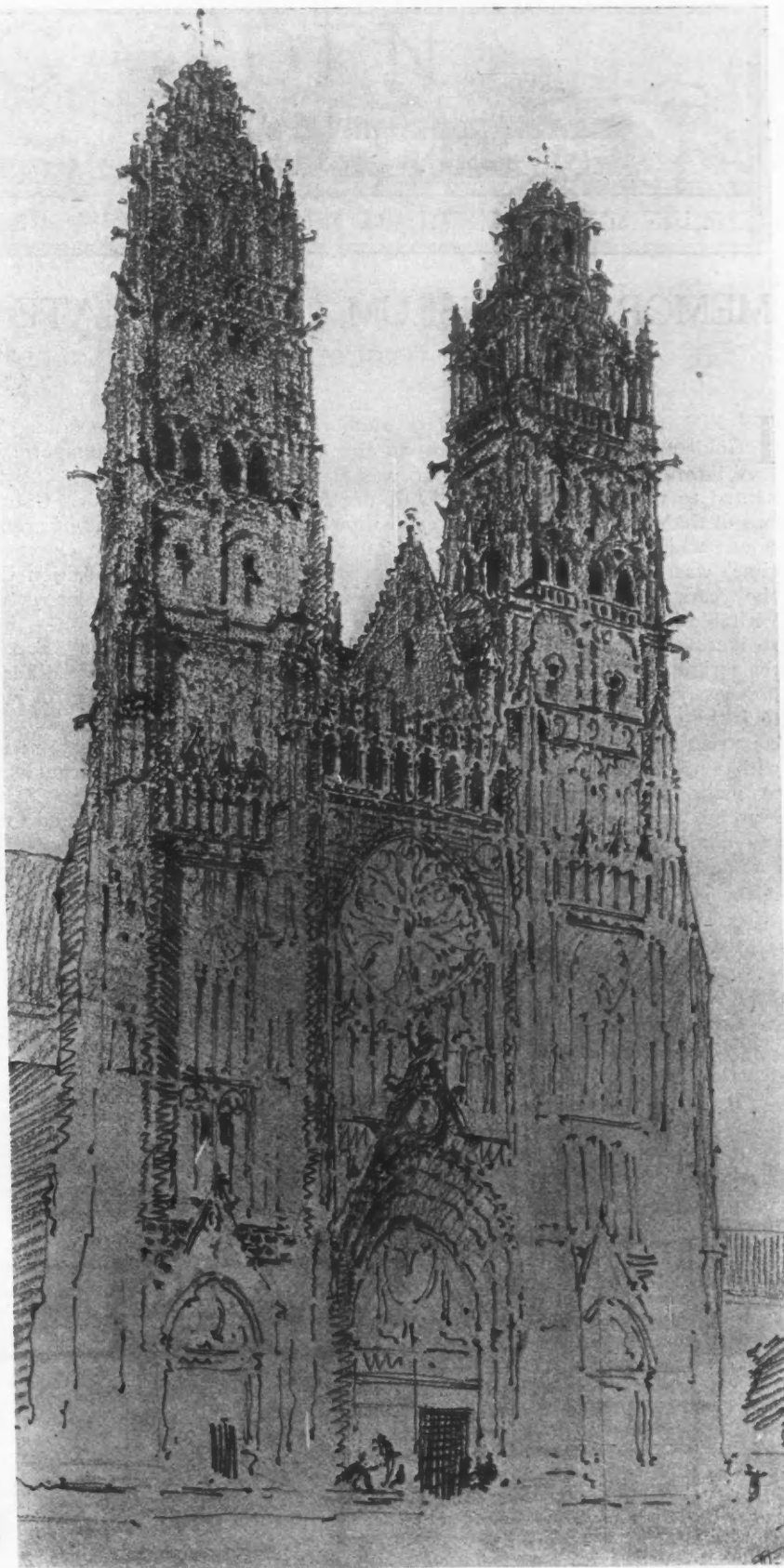
HOUSE AT TINTERN  
SKETCH BY ABE APPLETON

looked so dispirited, so useless, and the continual splash, splash, splashing of water was decidedly irritating. And just then a great truth burst upon us. Our architectural training had, it is true, inculcated the necessity of considering all the relevant factors in handling a problem of design. But this practical object lesson has enforced upon us more vividly than any amount of academic precept could have done the importance of the human and spiritual accompaniments to a design. Surely, consciously or unconsciously, the designer of this fountain had in his mind sunshine and children and nurse-maids and students, as well as stone pedestals and bronze sculpture; and deprived of these essential concomitants his work appeared quite flat and devoid of significance.

## THE BUILDING REVIEW

What brings this to mind now is a new manifestation of the importance of these imponderable elements in design. We are really writing a footnote to the appreciation which we published some time back of Maginnis & Walsh's lovely Carmelite Monastery at Santa Clara.\* It was recently our good fortune, on the occasion of the Feast of Our Lady of Mount Carmel, to attend Solemn High Mass in the Monastery Chapel. As we walked down the orchard lane to the Chapel entrance among other visitors on the same mission, bells large and small in the slender belfry burst forth into exultant pealing. When we entered, the air already throbbed with the sound of quiet organ music and simple chanting from the gallery overhead. Earlier arrivals filled the nave and aisles from the entrance doors to the front chairs. Flanking the altar glowed the yellow flames of clustered candles and tall tapers. Priests clad in embroidered vestments performed solemn rituals before the altars. Choir-boys swayed smoking censers whose fragrant odors permeated the Chapel air. Through the high eastern clerestory windows the morning sun streamed in beams of pale gold, lighting the opposite walls and the bended heads of the congregation. An occasional furtive vision of a veiled figure through the rear grilles communicating with the Nuns' Choir—or was it only a wreath of smoke from a swinging censer?—suggested the mystery of the impenetrable cloistered life within. Was this the same Chapel we had visited but a few months previously, when the sole interruption of the solitude was the echo of our own footfall on the pavement, and the only evidence of life without was the bouquet of fresh flowers in the niche of the Lady Chapel wall? We had warmly appreciated it on our former visit, and described it with sincere if restrained enthusiasm. Here were of a truth the identical architectural forms again, but animated with what a different spirit! It was like the bald facts of an architect's working drawing compared to the penetrating interpretative rendering of an artist's brush. Surely in designing this Chapel, consciously or unconsciously, the architects had thought of lighted candles and smoking incense and solemn music and slow-moving priests and kneeling worshipers. We had formerly only inspected, as it were, an empty vessel; now we beheld it brimful and overflowing with life.

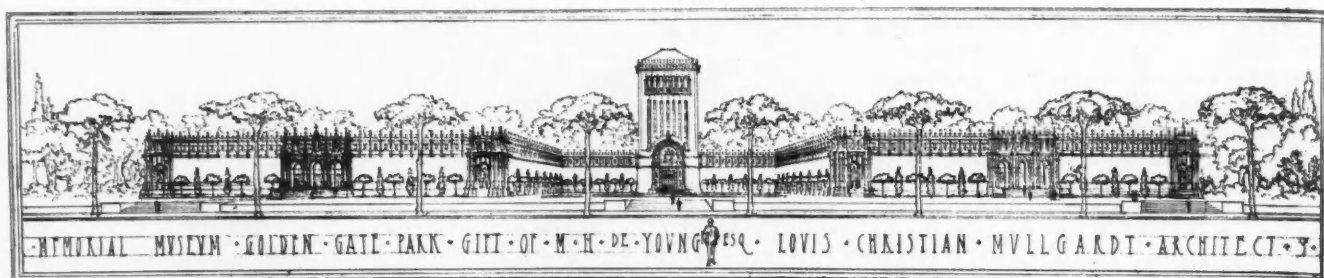
Veritably, true architecture is much more than an accumulation of building materials assembled in accordance with static and aesthetic laws.—I. F. M.



CATHEDRAL, TOURS  
SKETCH BY ABE APPLETON

\*The Carmelite Monastery of Santa Clara; *The Architect*, February-March, 1919, Vol. XVII, p. 89.





## MEMORIAL MUSEUM, GOLDEN GATE PARK, SAN FRANCISCO

LOUIS CHRISTIAN MULLGARDT, Architect

(Plates 18-24)

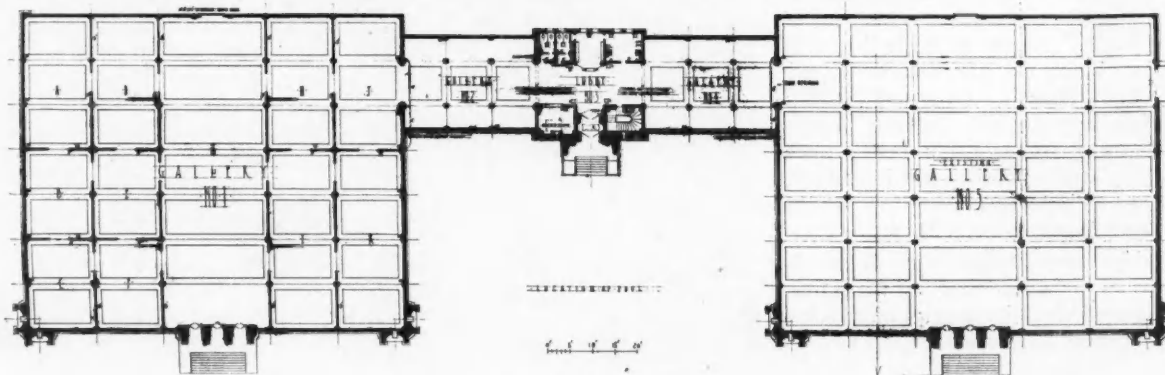
IN ITS inception San Francisco's Memorial Museum in Golden Gate Park goes back to the California Mid-Winter Exposition of 1893. It was founded and presented to the citizens by Mr. M. H. de Young, who was one of the moving spirits of that exposition; and its original home, which it has continued to occupy up to the present time, was the exposition's Fine Arts Building. During the years since its founding the Museum has become a veritable hobby with Mr. de Young, and its contents have so increased, largely due to his personal munificence, that the original building, even with additions, has become hopelessly inadequate. About 1916 Mr. de Young undertook the erection of a new building which alike in extent, construction, and aspect, should provide the institution with a worthy home, and Mr. Mullgardt was called upon to make such a design. The site chosen for the new Museum building immediately adjoins that of the old one, and marks the transverse axis of the Music Concourse. The design consists of two wings, nearly square, connected at the back by a neck which forms a U court, and out of which rises a tower. The north wing (the one on the right of the plan and elevation, and shown in photograph in Plates 18-21) was begun in 1917 and opened to the public the following year. The scheme is being completed by the erection of the south wing, similar to the north, and the tower (shown in drawing in Plates 22-24), both under construction at the present time.

It is an interesting co-incidence that, while the origin of the Memorial Museum is associated with San Francisco's first exposition of 1893, its new home is related to the city's great Exposition of 1915. In the Court of the Ages, or Court of Abundance, at the Panama-Pacific International

Exposition, Mr. Mullgardt first gave expression (unhappily in temporary form) to many of the ideas which he has subsequently embodied in permanent materials in the Golden Gate Park Museum. The entire decorative apparatus of profiles, columns, pilasters, consoles, and finials, is very closely analogous to that of the now demolished Exposition Court. But if the idiom of expression bears a striking resemblance to that of the earlier work, the composition—that is, the subject-matter treated—both in its entirety and in each of its several component elements, is utterly different. It is characteristic of Mr. Mullgardt's fertility of invention, also, that even among the details and profiles of the two works which are most closely allied there are none which, however similar, have not undergone significant variation in repetition.

The Museum likewise embodies a symbolism similar in scheme to that expressed in the Court, but worked out with more particular reference to the history of California. On the two wings the ornamental and sculptural details of the entrance and corner pavilions look back through pioneers and aborigines to the inception of primitive life itself; while the tower decoration looks forward to Honor Among Nations and the enthronement of Superior Intelligence. Can Mr. Mullgardt have had any consciously satirical intent in sweeping his gaze from an indefinitely remote past to a future apparently equally distant?

In finish the plain walls are plaster of a rich buff-pink color, combed horizontally to a delicate texture. The ornamental work is of cast cement, similar in color to the walls, but lighter in tone. The construction is reinforced concrete frame with filling panels of hollow tile. All lighting is overhead. The tower is designed as a campanile to receive chimes.—I. F. M.



PLAN

MEMORIAL MUSEUM, GOLDEN GATE PARK, SAN FRANCISCO

LOUIS CHRISTIAN MULLGARDT, Architect

# *The* GARDEN

## WHY THERE SHOULD BE A GARDEN

By DONALD McLAREN



A CORNER IN A CITY GARDEN

IT IS a noteworthy fact that when we think of home, or the home, which we left, the thought always seems to be associated with a beautiful plant, maybe a rose, or an oleander, or some other, which appealed to us strongly in our younger days. This enduring impression is just as appealing as that of some old favorite piece of furniture in the house itself which has endeared itself to our memory.

An impression seems in some way to have gotten abroad that we cannot have gardens without extensive grounds. This is erroneous. It is quite within reason to have very enjoyable gardens even on San Francisco twenty-five-foot lots, if we would apply ourselves and use a little ingenuity. As a matter of fact, it will be found that, even with most extensive grounds, the arrangement of the gardens, or grounds, if you choose to call

them so, immediately surrounding the house, is merely a setting for the house proper; while the whole estate is in most cases made up of a series of various garden effects united into one scheme.

The problem of house and garden design is one that, for its successful solution, must be worked out by the architect and the landscape man in collaboration. It is also necessary that the owner of the garden, or estate, co-operate as far as possible; for, in the end, he is undoubtedly the one who is to enjoy the ultimate result. I believe that in most cases insufficient attention is given to the most important feature of the garden, especially in California. We should consider our gardens more as outside rooms than we do, and in a great many cases as really a part of the house. We find this element in the so-called patio of the early

## THE BUILDING REVIEW

Californian days, which, by the way, is fast coming into vogue again, and which, to my mind, is a most charming feature. In our travels throughout the country we find that the patio effect is being used more and more in country places. It is certainly most effective as well as useful, and it enables us to make use of many varieties of beautiful climbers and plants which, except for its protection, we would have to do without.

To the visitor the chief interest of a garden depends upon the first impression received, and the importance of this fact cannot be over-emphasized in the working out or developing of the design. The first impression should be one of gladness in the garden's existence and enjoyment of it as a picture. For we who work with plants are really artists working with actual vegetable life instead of with paint and brush—the most essential difference being that it takes us a few years (in California a very

which there is really no excuse whatsoever. When an architect designs a house, he naturally has in mind a certain setting and picture as well as a frame for this picture; and in many cases, without the frame his picture will be entirely ruined. It is primarily the function of the landscape man to provide the frame, and in a good many cases the background, for the picture the architect has in mind. The great trouble is that we build our houses without any attempt whatsoever to conceive what the designer has in mind in recommending a certain type, after which we set out a few plants indiscriminately and are very much disappointed that we have not achieved an harmoniously appearing whole.

After the house has been built and the garden immediately surrounding it designed or laid out we should give consideration to what other effects are desired. Naturally it is presumed that



GARDEN OF DR. H. E. ALDERSON, SAN FRANCISCO  
MacRORIE, McLAREN CO., Landscape Gardeners



NOOK IN A SMALL GARDEN, SAN FRANCISCO  
MacRORIE, McLAREN CO., Landscape Gardeners

few) to develop our picture. We in the West are too impatient as a rule, and expect to obtain a finished picture immediately; but in garden work we must learn to have patience and give good old mother nature a chance to do her part.

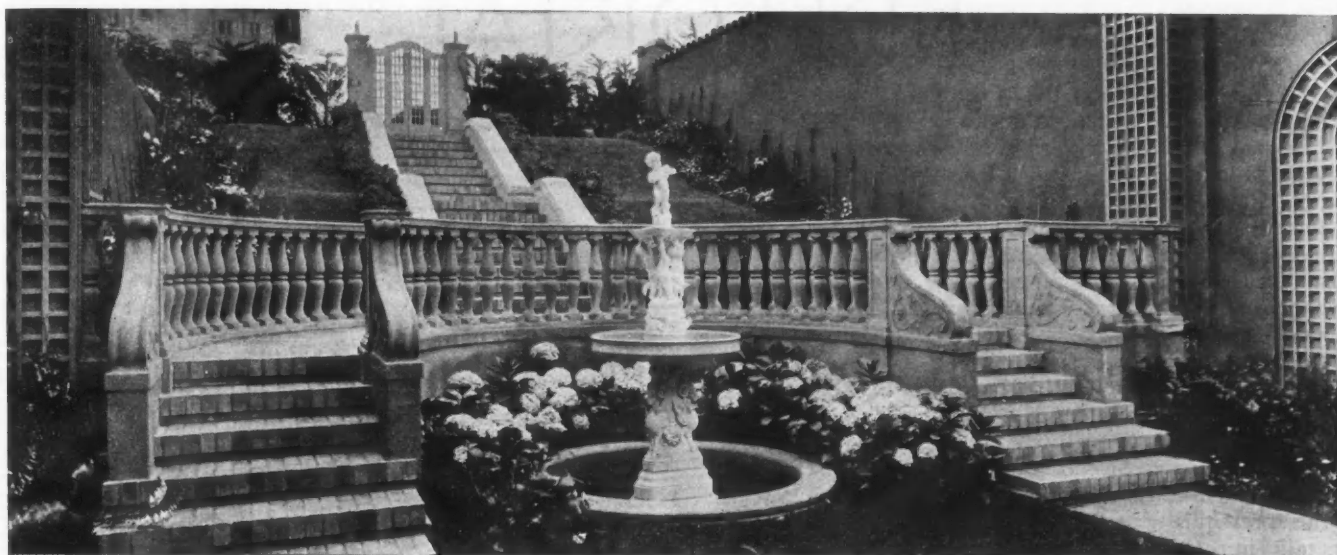
For the great variety of conditions which exist in California, it is absolutely impossible to outline or even to suggest in a general way any special form of garden. In some portions of our great State shade should be the dominating feature so far as enjoyment of a garden is concerned, while in other sections it is possible to develop any form of garden which will agree with the house design. And right here is where the co-operation of the architect and the landscape designer is most essential in order to obtain the best results; for it is an undoubted fact that the garden immediately surrounding the house should conform in design with the house itself. This is a condition which is too often lost sight of, even in some of our large estates, and for

we have already done what is the natural thing to do, that is, made provision for whatever natural views or vistas we desired preserved. If there is an unusual view it should be part of the garden—a fine painting in an out-of-door room. We should be very much more careful than we are at the present time with regard to the use of so-called garden ornaments, for the improper use of these features is often the cause of spoiling an otherwise lovely garden. A garden which depends upon a single feature, relying on expense or beautiful flowers or some other single attraction, will soon become monotonous and tiresome because of our ever having the same idea thrust into our minds; just as the ever recurring popular songs which appear from time to time, however "catchy" they may be, are not lasting, and are soon forgotten.

We hear a great deal of discussion with reference to formal and informal design of gardens, but if the question is considered a sensible point of view there should be no difference on this score.



## THE BUILDING REVIEW



GARDEN FOR MR. M. E. MOON, SEA CLIFF, SAN FRANCISCO (Newly Completed)  
MacRORIE, McLAREN CO., Landscape Gardeners

To my mind the design of the house should absolutely in all cases govern the style of garden to be created immediately adjacent to the house, after which the landscape treatment should be considered separately. I believe that we all prefer sweeping broad lawns wherever they are obtainable with natural groups of trees and shrubbery surrounding them, but this style of treatment demands large areas which are not always available. It is always possible, however, given the proper house design, to create a natural effect, even with a limited area; but it is much more difficult to obtain such an effect and also much more expensive than to treat in a small area in a formal manner. It will also be found that in many cases the success of the landscape plan will depend largely upon the use made of existing natural features. For instance, there may

be a certain tree which it is most important to preserve, and its advantageous utilization may determine the whole design in a small garden or in a certain portion of a larger one.

As a matter of fact, a garden, no matter how large or how small, properly treated and laid out, will be found to give great pleasure to its possessor; and I firmly believe that there will be much more interest displayed with regard to this most important feature of home life within the next few years than ever before. Some of us prefer certain plants while others of us lean to other varieties; but the majority of hardy species do so well and grow so readily in California that there is abundant room for all to indulge their preferences.



GARDEN FOR MRS. A. L. KUTNER, SAN FRANCISCO  
MacRORIE, McLAREN CO., Landscape Gardeners

## EDITORIAL

NOTHING is more irritating, more humiliating, nor more futile withal, than the necessity of explaining and justifying one's faith. Intellectual conceptions may be rationally dealt with, because they are of rational origin. Faith, on the other hand, is an essential and inexplicable part of one's being. It presents itself to one with an obviousness and a finality which dispense with argument and analysis. When questioned, therefore, on such points, one suffers painful surprise that there should be any obscurity in matters so clear, and keen resentment at the necessity of explaining matters so obvious. There is a subtle gratification in the elucidation of the abstruse; but expounding the obvious is a task which enrages. And it is the attempt to explain obvious matters that enforces upon one the uselessness of such effort in most cases; for in the absence of that psychological predisposition which is the prerequisite to faith the clearest explanation is generally unconvincing.

Every good architect must cherish as an article of faith a belief in the value, in the necessity even, of architecture and of the arts in general. And probably every architect has suffered the indignation of the query, What use is it? Sometimes the challenge is delivered with this literal, crude brusqueness; sometimes it is insinuated by indirections more polished but equally offensive. But in any case it involves the necessity of justifying faith. Many an architect has never consciously attempted rational deductions on so intimate and obvious a matter; his faith suffices. But even the architect of more critical temperament, who has threaded the labyrinths of social, ethical, and esthetic theory, and set the claims of art upon a firm foundation of reason, realizes that in general no explanation can satisfy a person capable of making so inept a demand. It is all very well for artists among themselves to enlarge upon the identification of the good and the beautiful; but when a hard-headed business man looks at a drawing, inquires the cost of the ornament around the doorway and in the cornice, and concludes with, What good is it?—what is to be said? One can not retaliate with thoughts on beauty as its own justification, or on its ennobling mission in life—at least an observing person is not likely to adopt twice such a line of attack. The emotionalism of esthetic dilettantism arouses the "practical" man's completest contempt, and a rigorous philosophical theory of esthetics is beyond his comprehension. Were he capable of appreciating the answer he would never have needed to ask the question. Thus do we see architecture languish before the seemingly overwhelming onslaughts of those who lack both feeling and knowledge; and of such only too frequently are our political and economic masters. Monumental architecture, being of all kinds the most expensive, is naturally the severest sufferer.

In the face of such a situation one would expect that the architectural profession would be on the alert promptly to seize and make the most of any possible practical justification for monumental architecture; but such an opportunity, we feel, is at hand though neglected. The recent Exposition in San Francisco was an eloquent object lesson on the possibilities of monumental building. To many practitioners idealistically inclined this was an attainment sufficient in itself; yet experience shows that it is not enough. We must not only demonstrate that monumental

architecture possesses beauty (which is never seriously denied), but that it possesses utility (and there's the rub). Now from out the welter of unfavorable circumstances of modern life there has emerged a real *raison d'être* for monumental architecture, and to the discredit of the architects be it said that not they, but the commercial interests, have been the first to make and to exploit the discovery. The automobile industry is to be credited with the realization that monumental architecture makes the most effective background for photographs of new-model cars. During the course of the Exposition every machine handled in San Francisco was photographed under the Tower of Jewels and before the Palace of Fine Arts and the California Building, for insertion in the motor sections of the Sunday newspapers. The Palace of Fine Arts has held its popularity to some extent during the subsequent years, and the new City Hall has demonstrated its adequacy for the same purpose. The architectural profession has been slow to grasp the significance of this fact: here at last is a strong practical justification for monumental architecture! The architectural background is, of course, not an unvarying necessity; in fact, sound psychology demands that a certain amount of variation should be maintained. Dealers have recognized this, and furnished occasional relaxation through well-chosen country scenes, and young ladies occupied in dry-bathing at the sea shore; and the introduction of a prominent personage at the wheel is an unfailing attraction. But monumental architecture still offers the most dignified setting, especially for the first arrivals of the year's new models.

To the architect the lesson should be obvious. He has at his command, of course, a direct means of gaining the recognition of one of the largest and most prosperous industries in the country. But even this is secondary to the fact that he is left with the whip hand over the entire architectural field. Henceforth when a client or politician smudges his finger over neatly drawn balustrades or sculpture or domes with the queries, What will it cost? and What good is it? the architect is no longer under the necessity of deferentially and apologetically explaining that these things add to the significance and joy of life, for the very reason that their only use is spiritual. Such sentiments, as well as the dignified tone in which they must be delivered, are offensive to the "practical" man. But now the architect is in a position to declare: Sir, in front of such a building as this there are certain to be photographed automobiles in varieties exceeding the wildest dreams of the most energetic purveyor of pickles! This, be it noted, is not a reply; it is a "come-back."

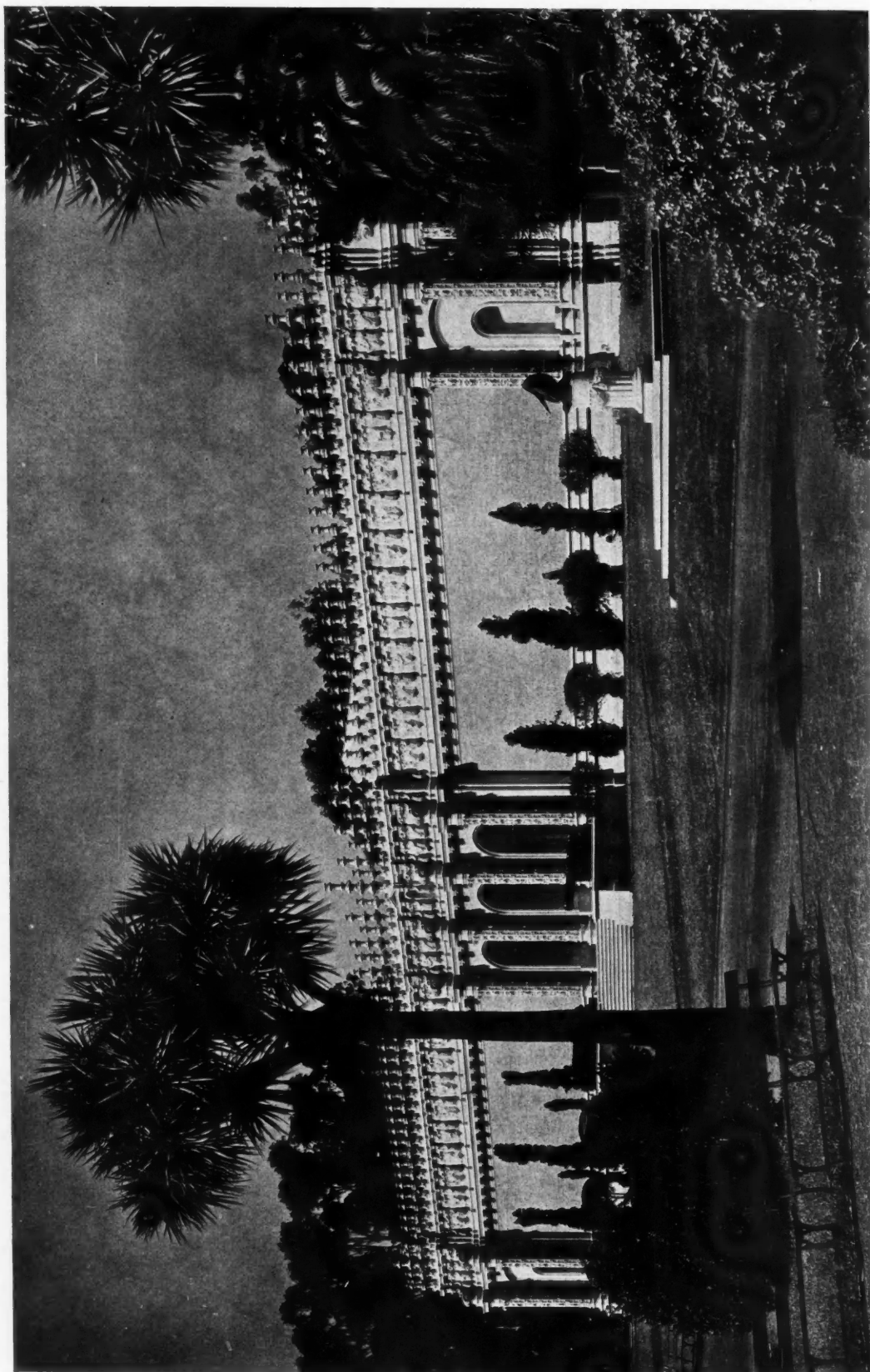
The proposition carries with it a corollary of equally great hope for the architect. Obviously the same setting can not be used too frequently for the same car. Already the Palace of Fine Arts and the San Francisco City Hall are *hors de concours* because of previous exhibition; other structures are rapidly approaching their limit of usefulness. Nothing is plainer than that we are enormously underbuilt, and that the automobile industry is forcing a need for ever greater quantities of monumental architecture. Architects have proved their ability to design buildings with the adequate pictorial qualifications; it only remains to demonstrate that they can keep pace in output with the ever increasing volume of new cars.—I. F. M.



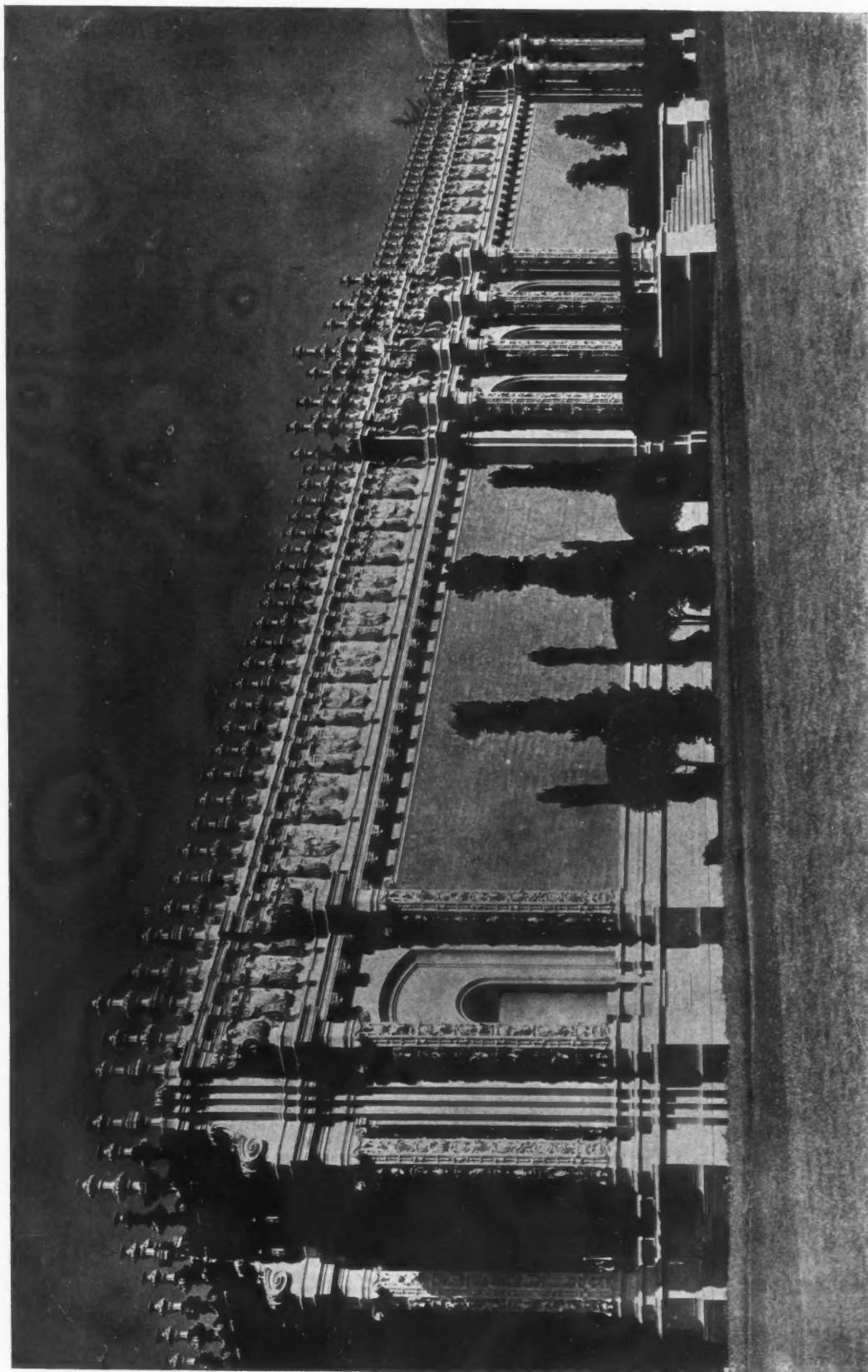


Irving F. Morrow. January 1919

MISTY EVENING  
THE CITY HALL, OAKLAND, CALIFORNIA



GENERAL VIEW OF NORTH WING  
MEMORIAL MUSEUM, GOLDEN GATE PARK, SAN FRANCISCO  
LOUIS CHRISTIAN MULLGARDT, Architect

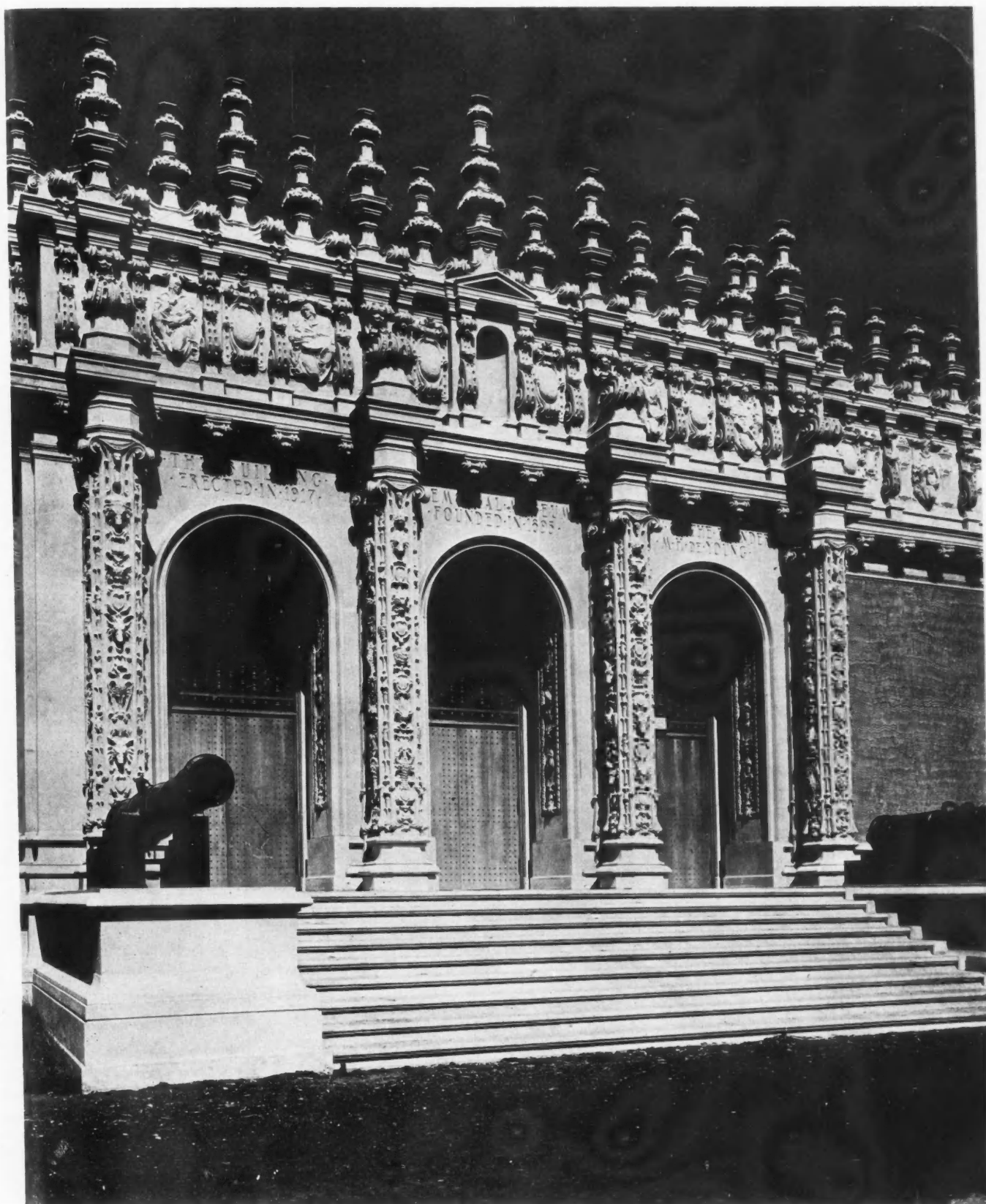


FRONT OF NORTH WING  
MEMORIAL MUSEUM, GOLDEN GATE PARK, SAN FRANCISCO  
LOUIS CHRISTIAN MULLGARDT, Architect



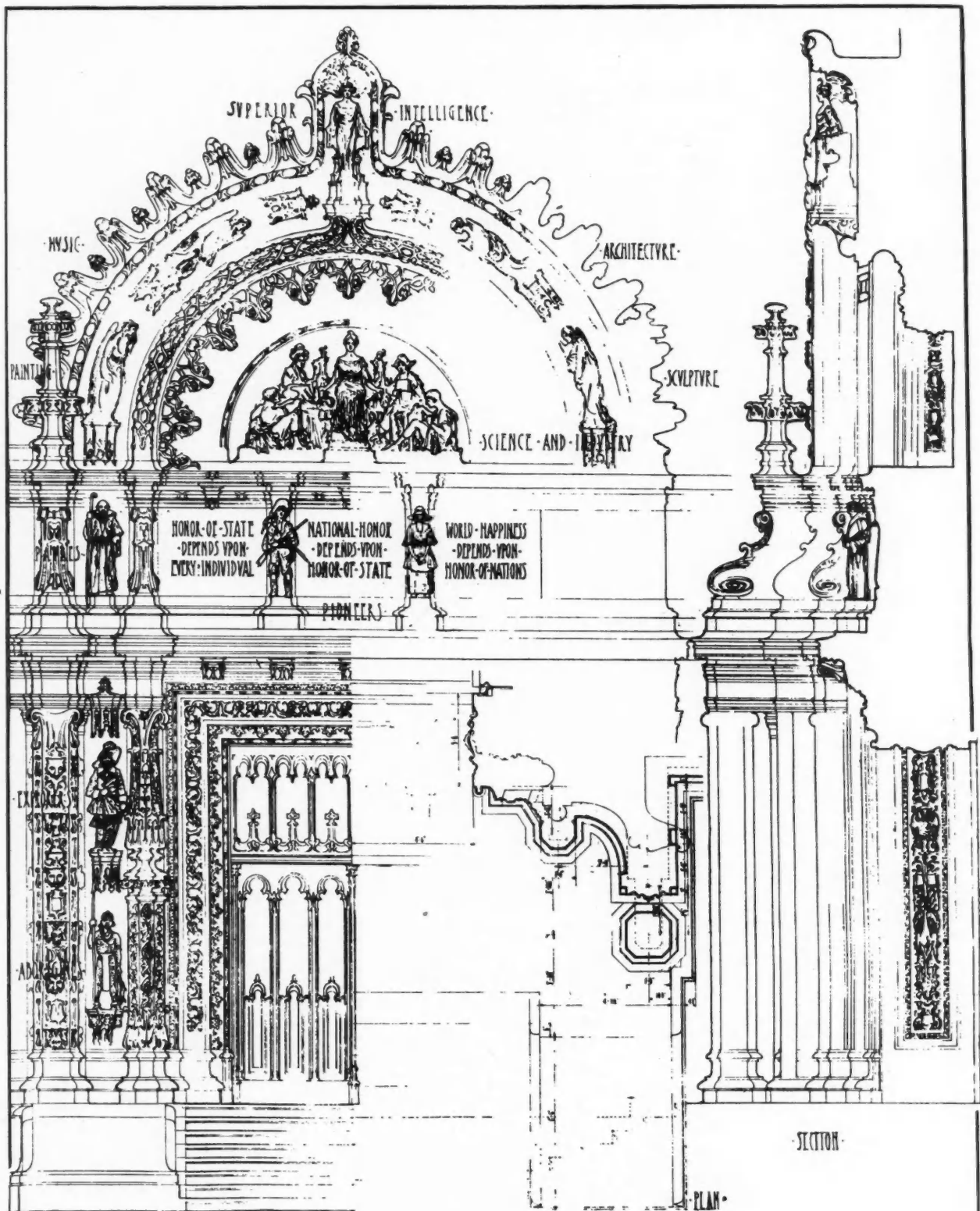


DETAIL OF CORNER  
MEMORIAL MUSEUM, GOLDEN GATE PARK, SAN FRANCISCO  
LOUIS CHRISTIAN MULLGARDT, Architect



DETAIL OF ENTRANCE  
MEMORIAL MUSEUM, GOLDEN GATE PARK, SAN FRANCISCO  
LOUIS CHRISTIAN MULLGARDT, Architect





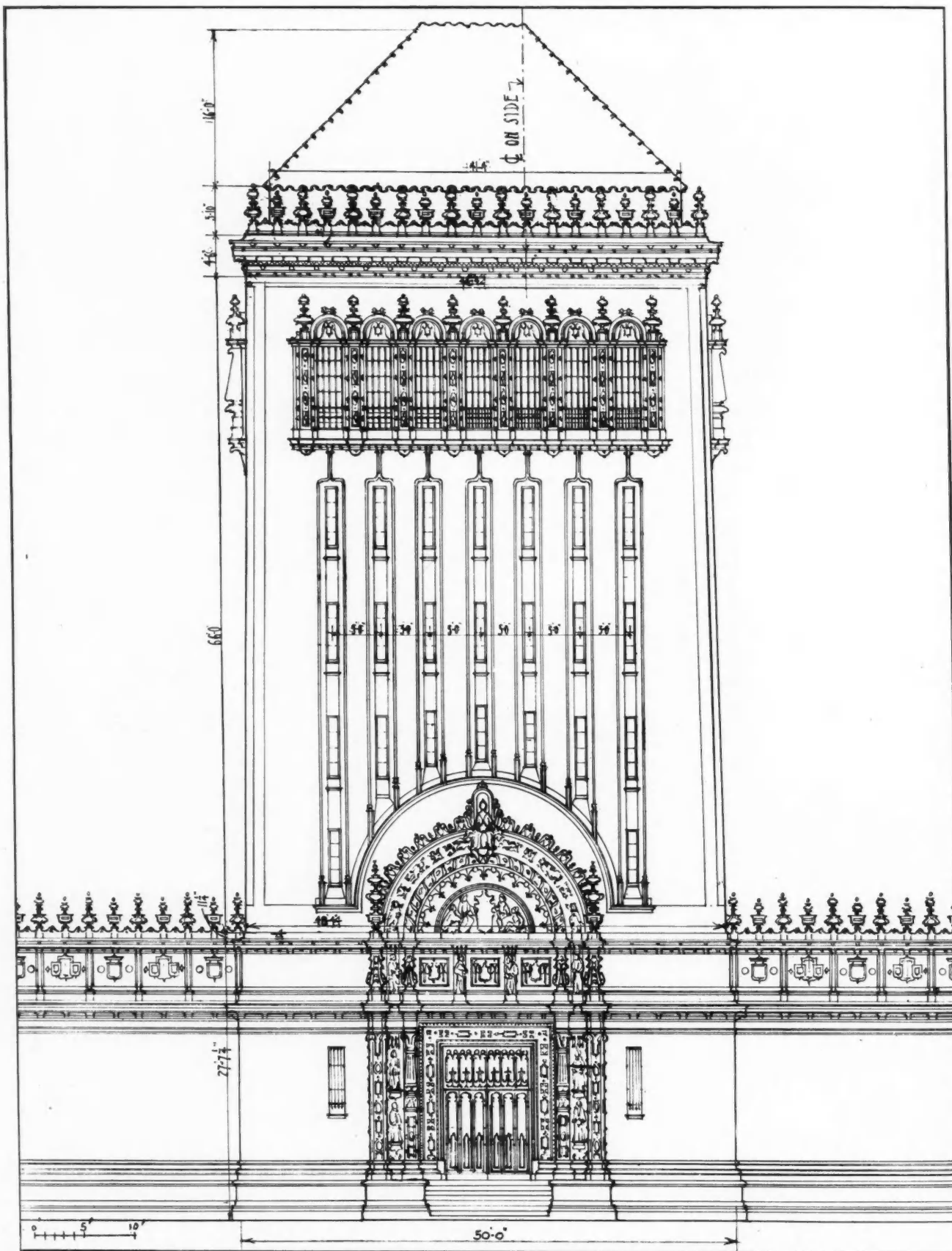
ONE- INCH SCALE DETAIL OF THE TOWER ENTRANCE OF THE MEMORIAL MUSEUM GOLDEN GATE PARK  
SAN FRANCISCO CALIFORNIA GIFT OF M. H. DE YOUNG 1916 LOUIS CHRISTIAN MULLGARDT ARCHITECT

ALL MODELS MUST BE MADE SUBJECT TO ARCHITECT'S APPROVAL

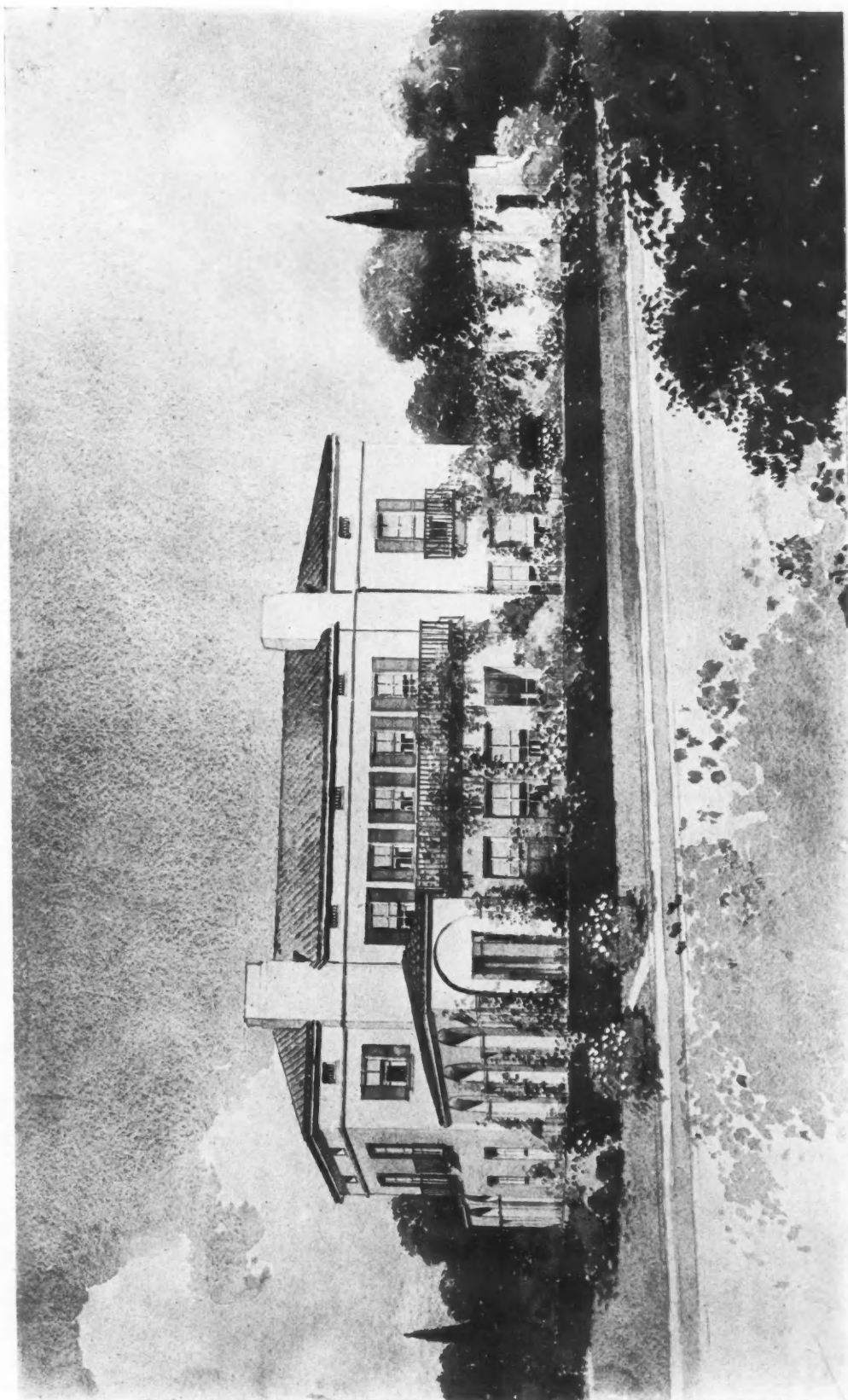
28

DETAIL OF TOWER ENTRANCE  
MEMORIAL MUSEUM, GOLDEN GATE PARK, SAN FRANCISCO  
LOUIS CHRISTIAN MULLGARDT, Architect



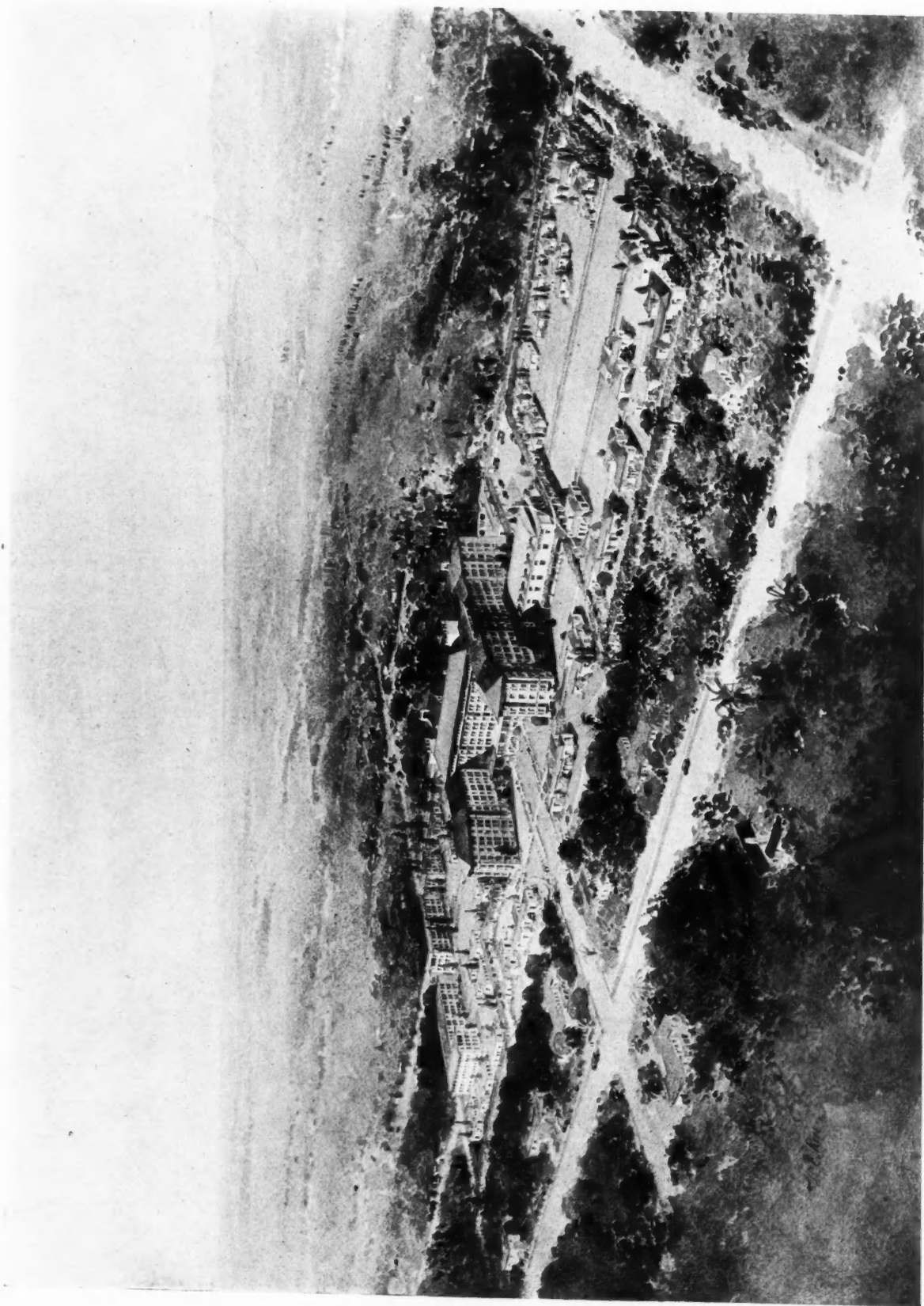


FRONT ELEVATION OF TOWER  
MEMORIAL MUSEUM, GOLDEN GATE PARK, SAN FRANCISCO  
LOUIS CHRISTIAN MÜLLGART, Architect



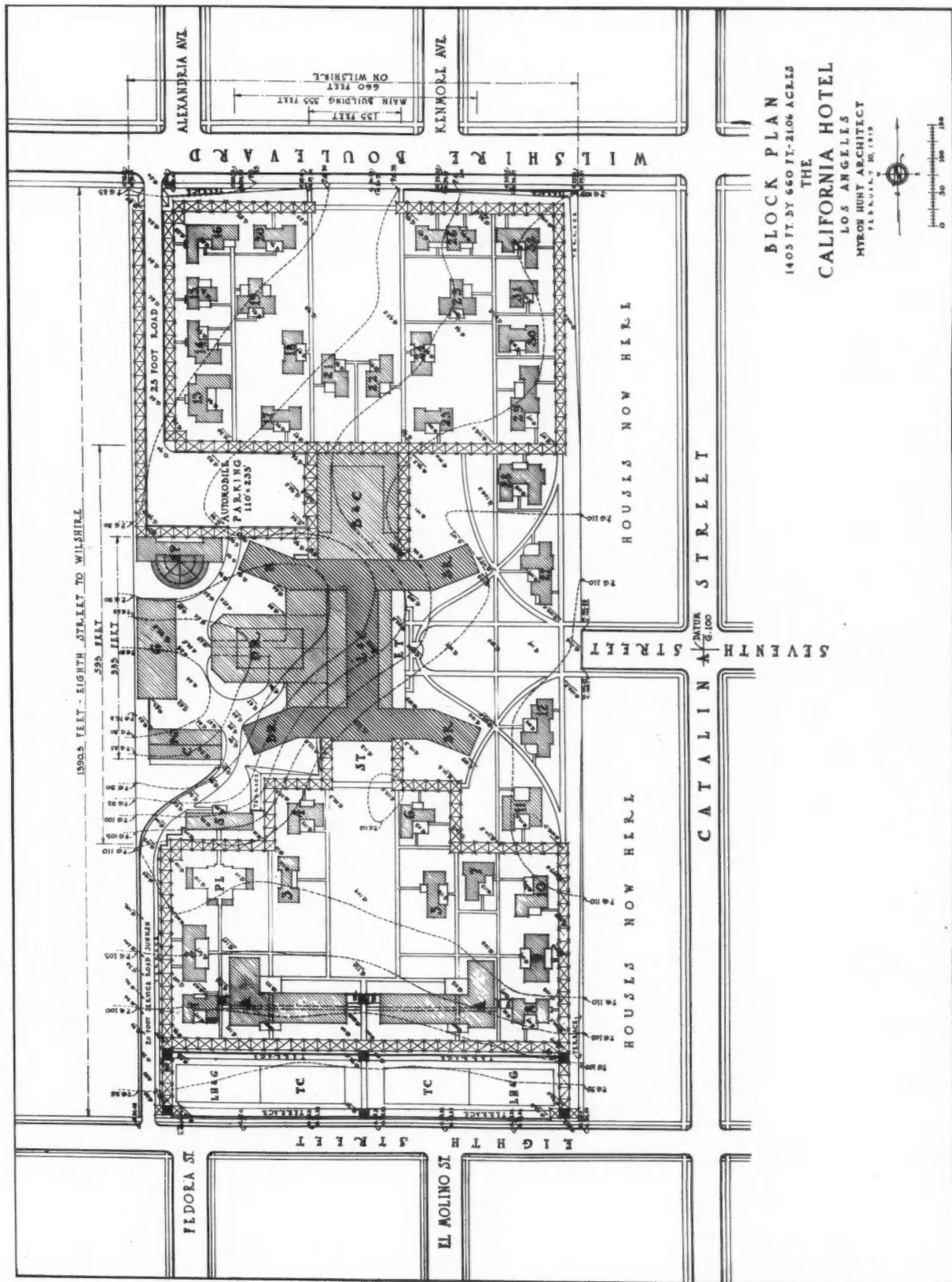
PERSPECTIVE FOR RESIDENCE  
MYRON HUNT, Architect





BIRD'S EYE VIEW  
CALIFORNIA HOTEL, LOS ANGELES, CALIFORNIA  
MYRON HUNT, Architect







VIEW FROM FRONT  
HOUSE FOR MR. R. C. MASON, ST. FRANCIS WOOD, SAN FRANCISCO  
GERTRUDE E. COMFORT, Architect



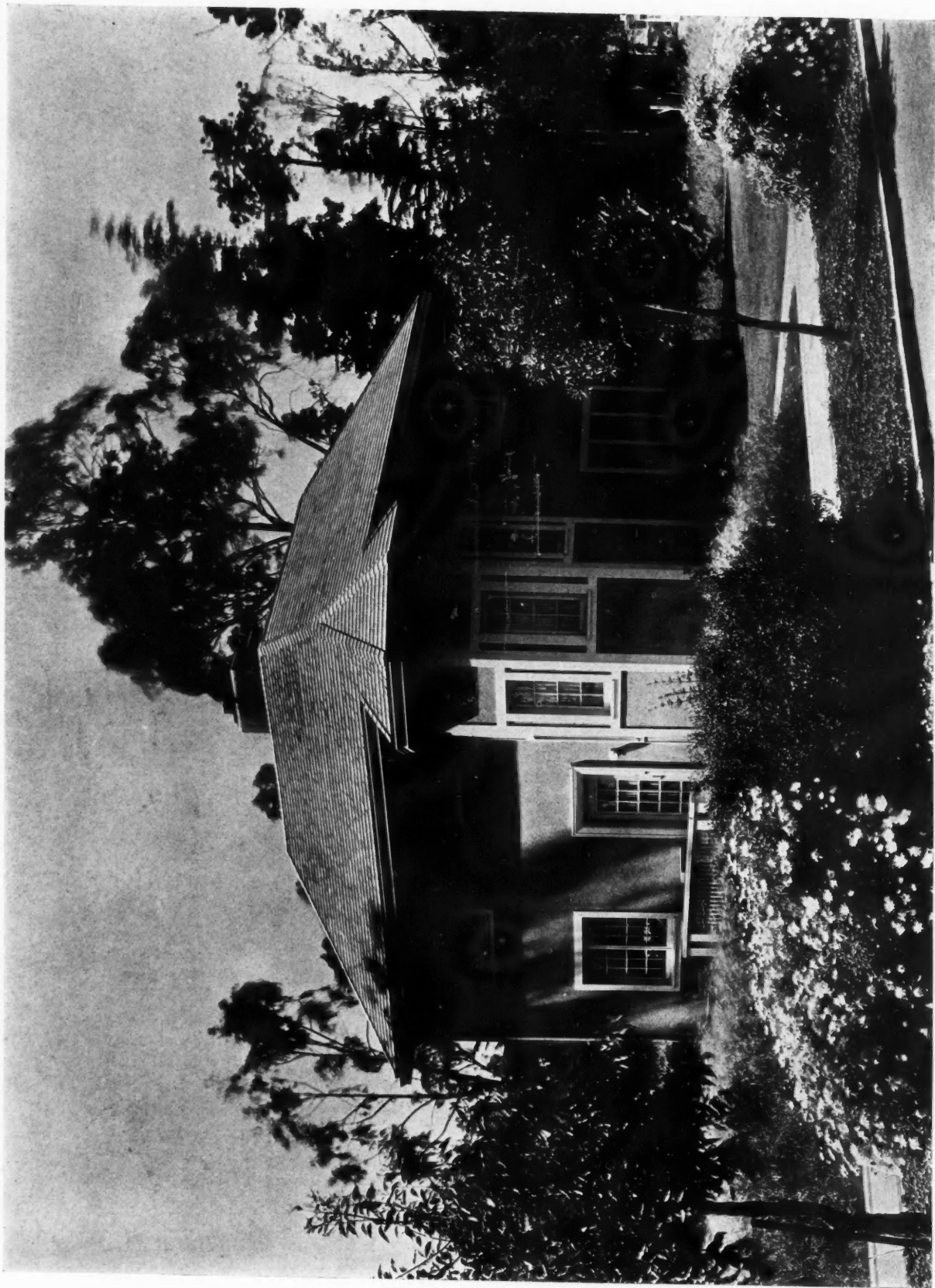
LIVING ROOM



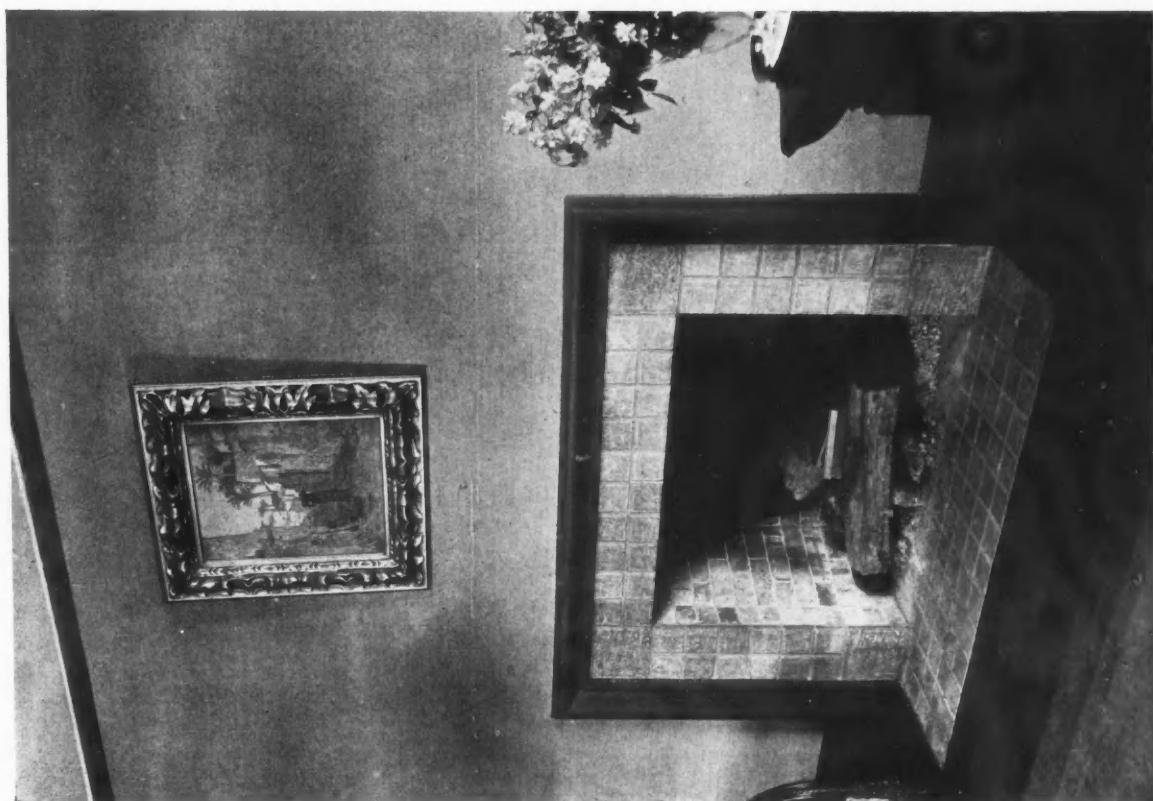
DINING ROOM

HOUSE FOR MR. R. C. MASON, ST. FRANCIS WOOD, SAN FRANCISCO  
GERTRUDE E. COMFORT, Architect





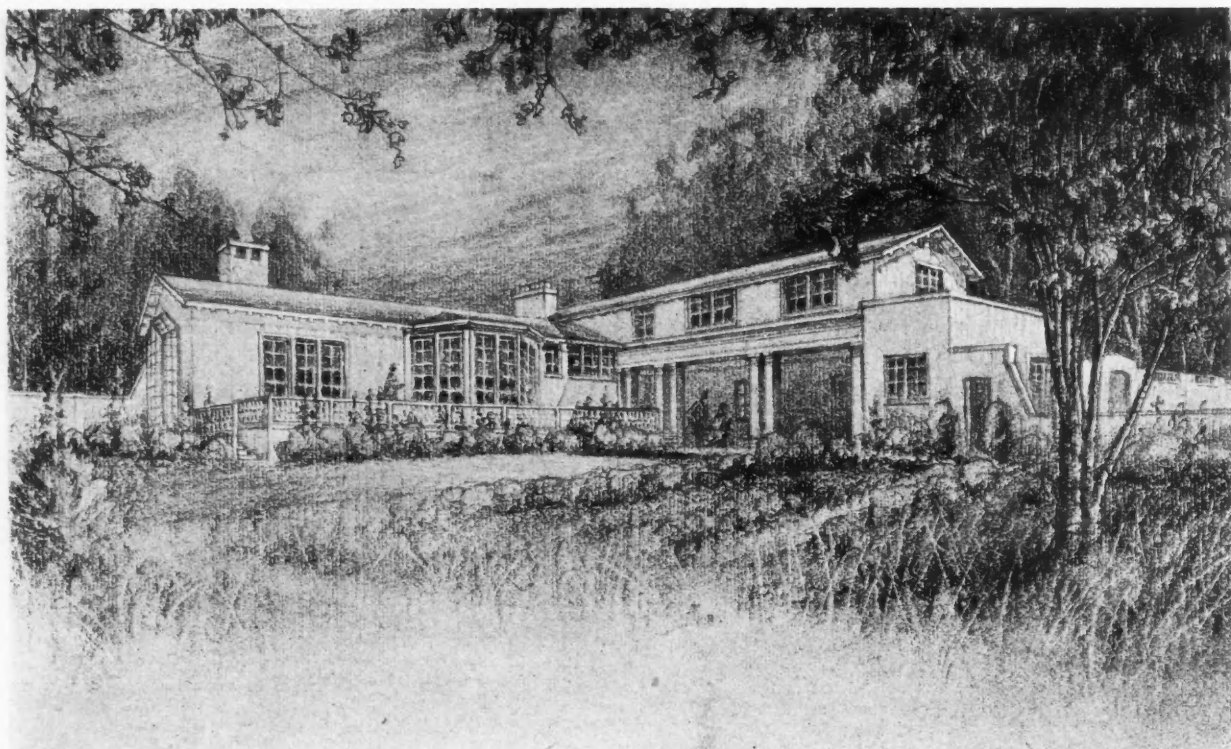
GENERAL VIEW  
HOUSE FOR MR. J. F. E. RICE, ST. FRANCIS WOOD, SAN FRANCISCO  
GERTRUDE E. COMFORT, Architect



LIVING ROOM FIRE PLACE  
HOUSE FOR MR. J. F. E. RICE, ST. FRANCIS WOOD, SAN FRANCISCO  
GERTRUDE E. COMFORT, Architect

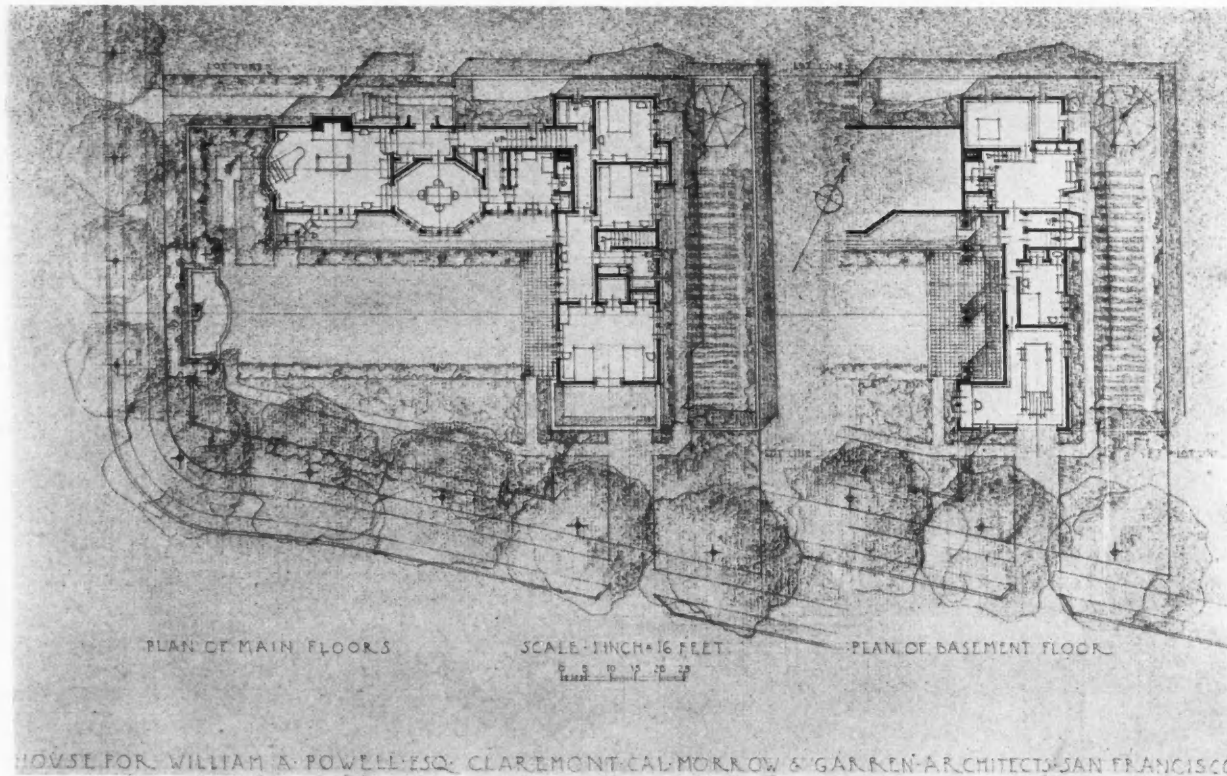


ENTRANCE HALL,  
HOUSE FOR MR. J. F. E. RICE, ST. FRANCIS WOOD, SAN FRANCISCO  
GERTRUDE E. COMFORT, Architect



HOUSE FOR WILLIAM A. POWELL, ESQ., CLAREMONT, CAL. MORROW & GARREN ARCHITECTS, SAN FRANCISCO

VIEW FROM GARDEN



HOUSE FOR WILLIAM A. POWELL, ESQ., CLAREMONT, CAL. MORROW & GARREN ARCHITECTS, SAN FRANCISCO

PLANS  
HOUSE FOR MR. WM. A. POWELL, CLAREMONT, CALIFORNIA  
MORROW & GARREN, Architects



# *The* HOME BUILDER



A.—NOTE THE SKILLFUL TREATMENT OF ENTRANCE PORCH TO HARMONIZE WITH BOTH ROOF AND WALL

## UNDER THE SPREADING FAMILY ROOF-TREE

By HARRIS ALLEN

**T**HE essential function of a roof is to shelter. Now the word "shelter" means more than protection from the weather; it means protection from the daily struggle for existence, from the jostling of the crowd, from the glaring sunshine of competition and the storms of business troubles. A man's home is the place to which he returns after the conflict of the day, to rest and re-create, to get renewed energy for the next day's struggle. And it is the place to which he brings his friends to enjoy the warmth of his hearth, to share the hospitality of his table and the shelter of his roof.

All this, and much beside, is what ought to be conveyed by the roof of a home. Yet too often it seems to have been considered almost as an after thought—to be put up with as a necessary evil, but disguised or concealed as far as possible. And occasionally one sees a roof which has been carried to the other extreme, so top heavy that it almost seems to smother the life beneath, or so laden with ornament that it entirely loses the feeling of repose and domesticity that becomes it best.

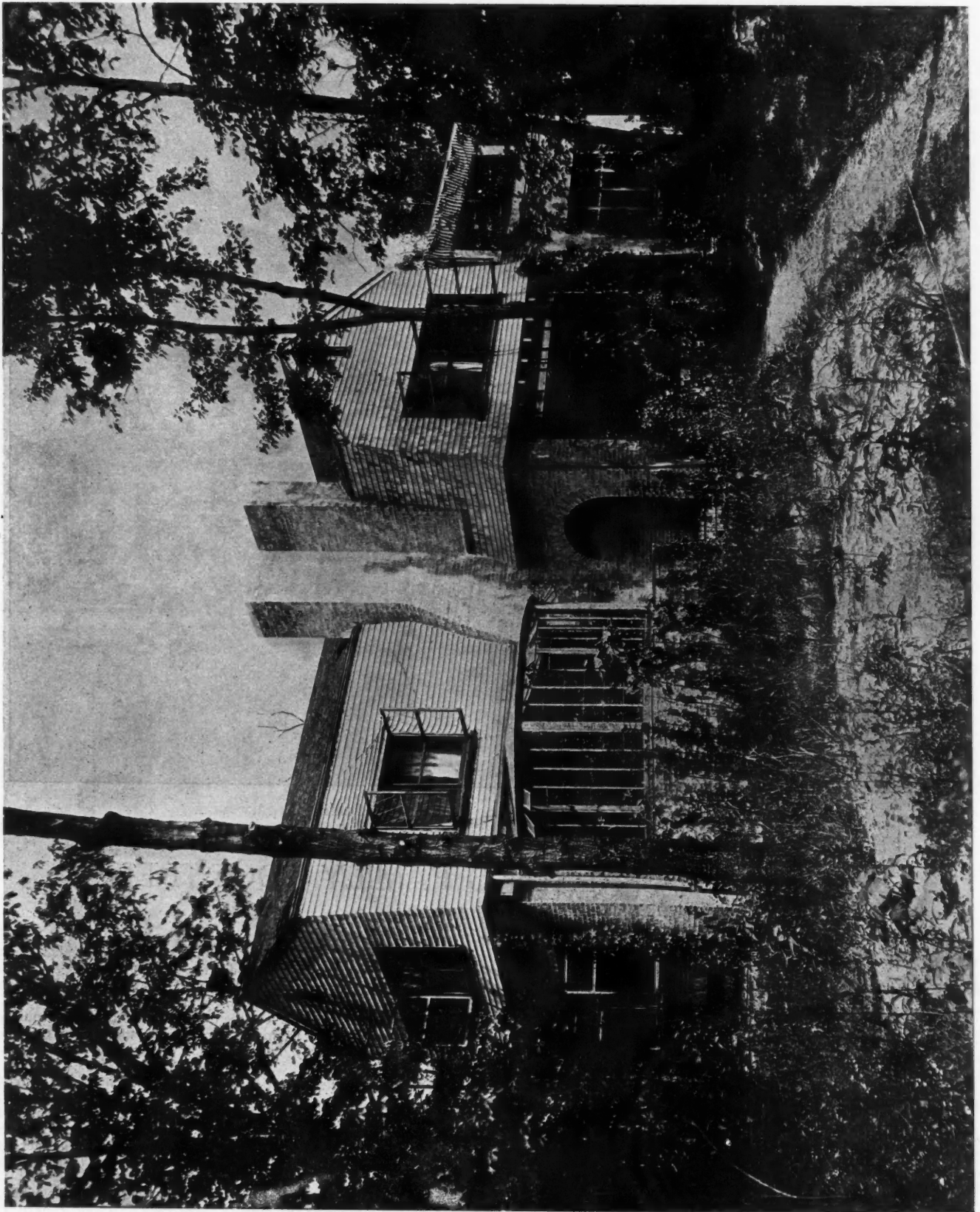
It appears to be plain that a roof, as an essential part of the building, should receive the same careful study as other parts of

the house; and as the crowning feature, and one to which there has been attached, since mankind first sought shelter, so much of symbol and sentiment, it even merits especial consideration aside from requirements of structure and style.

No hard and fast rules can be laid down, but certain points may be mentioned in the examples here shown, and the prospective home builder can readily find food for thought in any neighborhood.

Exhibit A is an unpretentious dwelling whose inviting, latticed entrance porch is tied to the main building by cornice and roof; the lines of ridge and eaves harmonize with the level lawn, and the plain gables continue the feeling of pleasant domestic life—one could wish that the rake moulding had not been carried across the chimney, and that the front gable had continued to the main roof, with no returning side wall.

Exhibit B, with roof carried down and wedded to its walls, and echoing the lines of the sloping trees among which it nestles, truly offers a retreat from the rush of the busy world. The charm of this informal composition, and its harmony with environment, is emphasized by the gambrel treatment, and the sturdy



B.—A STEEP GAMBREL ROOF MAKES A SLOPING SECOND STORY IN THIS DELIGHTFUL COMPOSITION

## THE BUILDING REVIEW



C.—THIS PICTURESQUE ROOF FITS THE IRREGULAR CONTOURS OF THE HILL

brick walls and chimney prevent the roof from appearing too heavy for the size of the building.

Exhibit C is not only picturesque but home-like. Situated on a sunny knoll, its wide-spreading eaves provide grateful shade; its roof lines harmonize with the irregular slopes of the site; it fits into the contour of the hill. A noteworthy use has been made of the natural rough cobblestone, which balances admirably the broad surfaces of the roof.

Exhibit D is more reminiscent than the other buildings shown, and is very successful in being both compact and picturesque, with its curved gables suggestive of English thatched cottages. Without the large dormers, the roof would have appeared clumsy; but they lighten the composition without being trivial. The horizontal lines of eaves and cornices are consistent with the setting. The generous proportions of this house, its low set door, its sunny bays, and the absence of hard straight lines all give it an air of warmth and hospitality, a very definite character of "homeliness."



D.—REMINISCENT OF AN OLD ENGLISH THATCHED ROOF COTTAGE

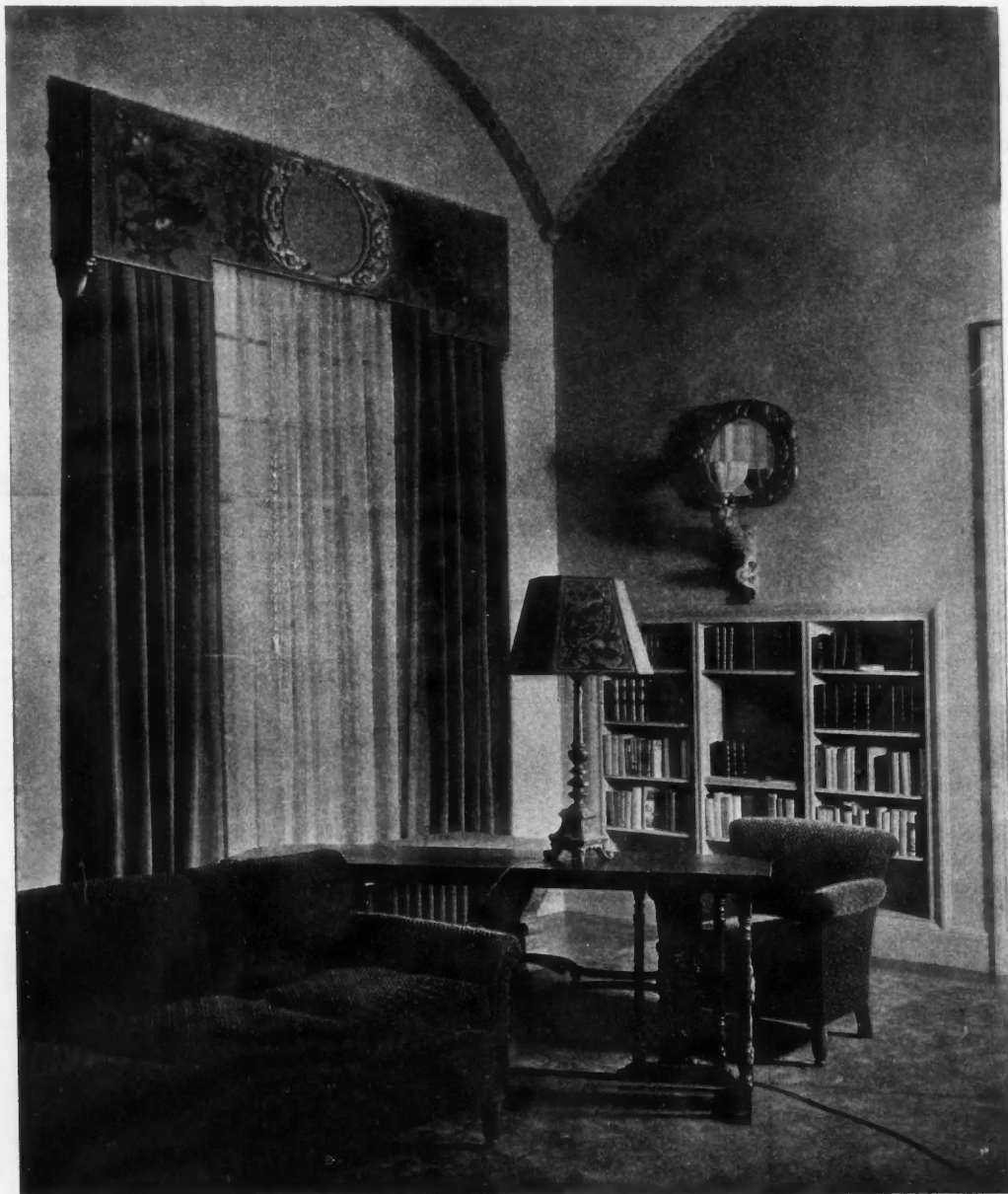


THE BUILDING REVIEW

# INTERIOR DECORATION

SOME CONSISTENT INTERIORS

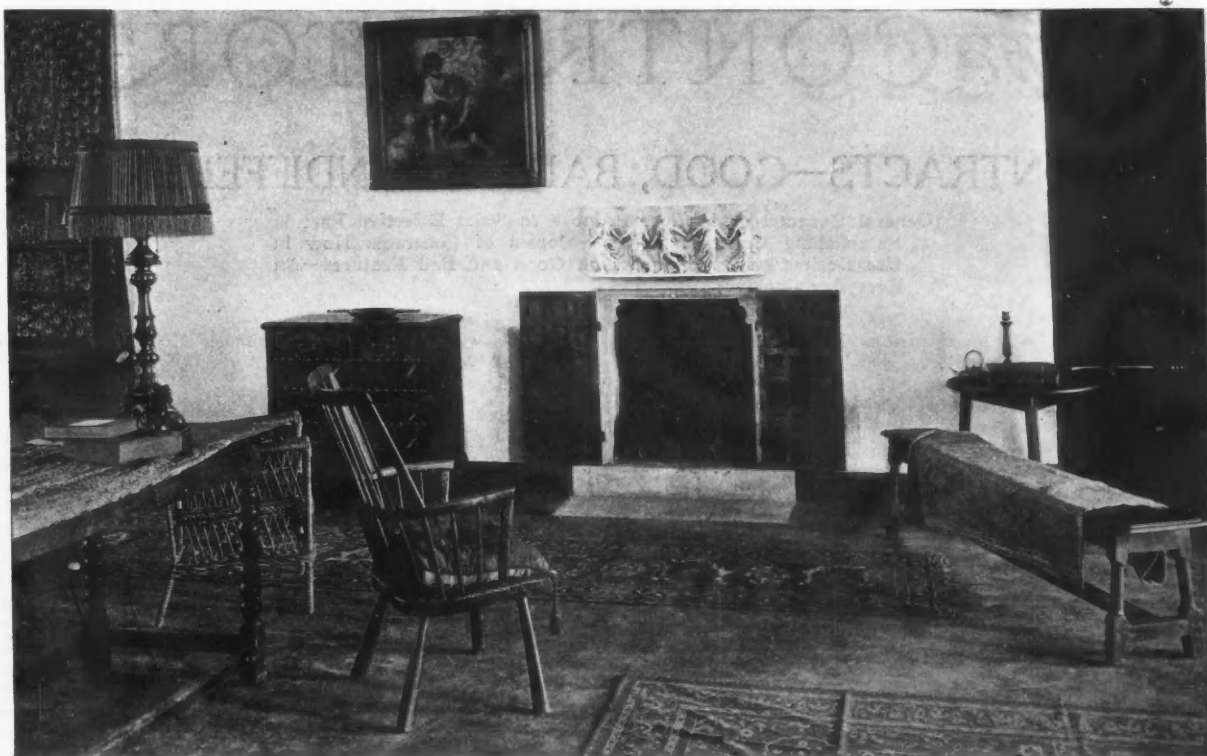
SHOWING THE EFFECTIVE TREATMENT  
OF PLAIN PLASTER WALLS



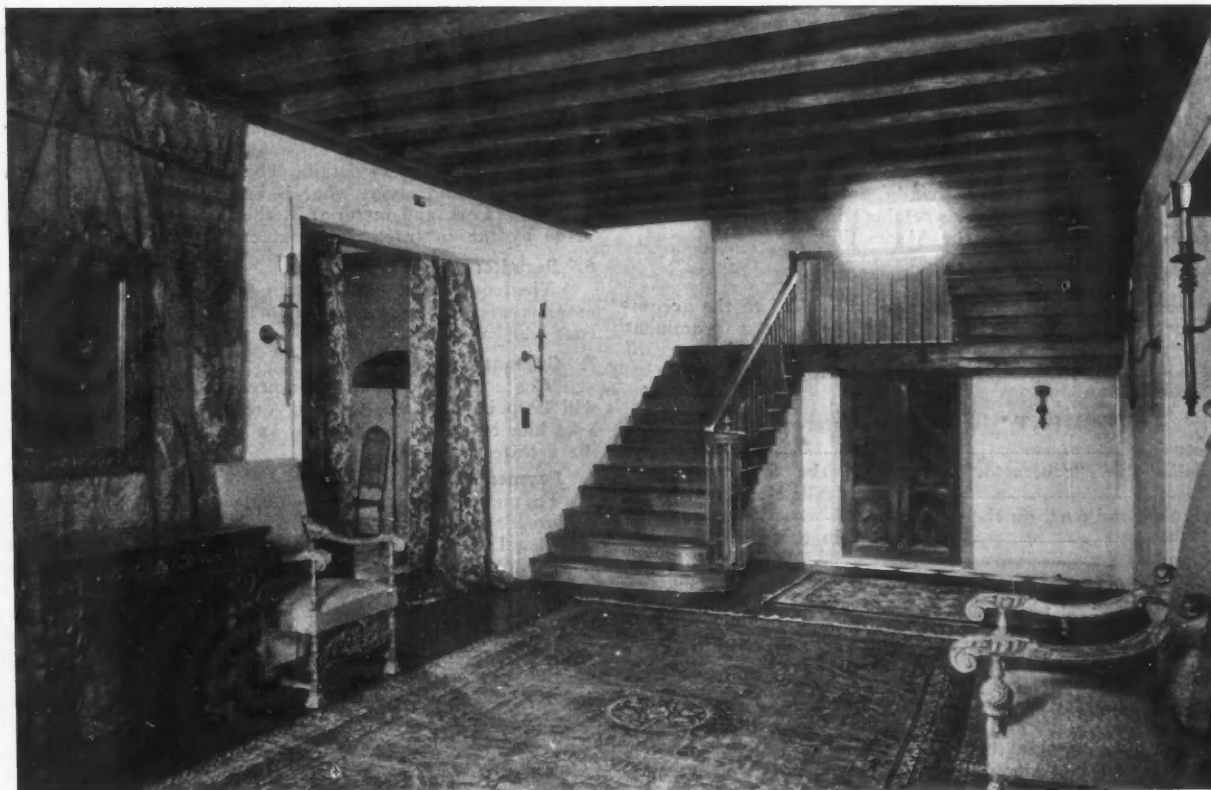
LIBRARY

BLISS AND FAVILLE, Architects

# THE BUILDING REVIEW



LIVING ROOM—MYRON HUNT, Architect



HALL  
MARSTON AND VAN PELT, Architects

# The CONTRACTOR

## CONTRACTS—GOOD, BAD AND INDIFFERENT

General Contractors at Last Propose to Take Effective Part in Establishing Contract Forms—Copies of Contracts Now in Use Desired with Comments on Good and Bad Features—An Everyday Contract

CONTRACT forms and specifications have been the subject of special study by engineers and architects for a number of years. The American Institute of Architects has developed the Standard Documents; the American Railway Engineering Association has adopted a uniform general contract form; a special committee of the American Society of Civil Engineers have the subject now under consideration. To date the only voice which the general contractor, who is the one man most vitally interested in contracts, has had in the matter has been either on the invitation of some one of the committees of these associations, as an ineffectual protester in some local exchanges, or as the victim of circumstances on an individual contract. What he has said before the committees of engineers and architects has doubtless had some effect on the final results and at least has put the contractor's position on file. What he has said in his local exchange or in the secluded recesses of his own office will doubtless never be allowed publication. The A. G. C. now proposes, however, to make the general contractor's position clear and effective on the subject of contracts. It proposes to make a careful study of existing forms, both good and bad, of every kind and in co-operation with the engineers and the architects to eliminate unfair practices and to establish clear, definite, and equitable clauses in contracts under which general contractors of recognized standing will work.

### Send Secretary Copies of Contract Forms

To do this effectively the Committee on Contracts desires to secure from each member:

(1) Copies of the various forms of contract under which you have recently performed work—unit price, lump sum, cost plus percentage, cost plus fixed fee, cost plus sliding scale, cost plus fixed fee with adjustments, etc., and

(2) A statement of the especially good or bad features in these which you would like to see retained in, or eliminated from any standard form adopted by the Association.

### An Everyday Contract

The attention of members is particularly called to the accompanying form of contract recently submitted by a prominent contractor as embodying most of the outstanding features of everyday contracts. Suggestions or additions to it are invited.

THIS AGREEMENT,\* made and entered into by and between ..... (called the "contractor"), party of the first part, and ..... (called the "owner"), party of the second part, on the ..... day of ..... in the year Nineteen Hundred and ..... WITNESSETH, That the Contractor and the Owner for the considerations hereinafter named agree as follows:

\*Reprinted from Truscon News, published by the Trussed Concrete Steel Company of Canada, Limited, Walkerville, Ont.

#### 1. Scope of Contract:

The plans and specifications are to be taken together. Anything shown on the plans and not mentioned in the specifications and anything mentioned in the specifications and not shown on the plans are to be considered as both shown and specified; and anything wanted by the architect or any of his friends, or anybody else (except the contractor) shall be considered as shown and specified, implied and required, and shall be provided by the contractor without expense to anybody but himself. If he can do

the work without expense to himself the work shall be taken down and done over again, until the expense is satisfactory to the architect.

#### 2. Architect:

The term "Architect" herein appearing shall be understood to mean the architect or any engineer that he foolishly but courteously employs to assist in making trouble for the contractor.

#### 3. Plans:

The plans are to be considered diagrammatic, and are to be followed only where space conditions make it possible to avoid so doing. Coincidence between the plans and executed work shall not be considered a claim for extra compensation. The architect is not required to recognize coincidence. Anything that is right on the plans is to be considered right; anything that is wrong on the plans shall be discovered by the contractor without telling on the architect or showing on any bills. Anything that is forgotten or missed out of the plans or specifications, but which is necessary and required for the comfort and convenience of the owner, shall be provided by the contractor, to the satisfaction of everybody (except the contractor) and in full accord with the evident intent and meaning of the specifications, without extra cost to anybody but the contractor.

#### 4. Rules and Regulations:

The work throughout shall comply with all rules, regulations, caprices and whims of all city, county, state, national and international departments, bureaus and officials having or not having jurisdiction.

#### 5. Materials:

All materials shall be the best of their several kinds.\* The contractor is expected to know and provide the best, irrespective of what is specified in detail. The architect reserves the right to change his mind about what is best. Any changes necessary to make the work and material fit the mind of the architect shall be made by the contractor without extra charge.

#### 6. Permits:

The contractor shall obtain and pay all fees, annual dues, assessments and subscriptions to masked balls, organizations and coat and hat checks.

#### 7. Guarantee:

The contractor shall guarantee and does guarantee that he will keep in complete working order anything that the architect asks him to attend to, so long as there is more work in sight in the architect's office.

#### 8. Payments:

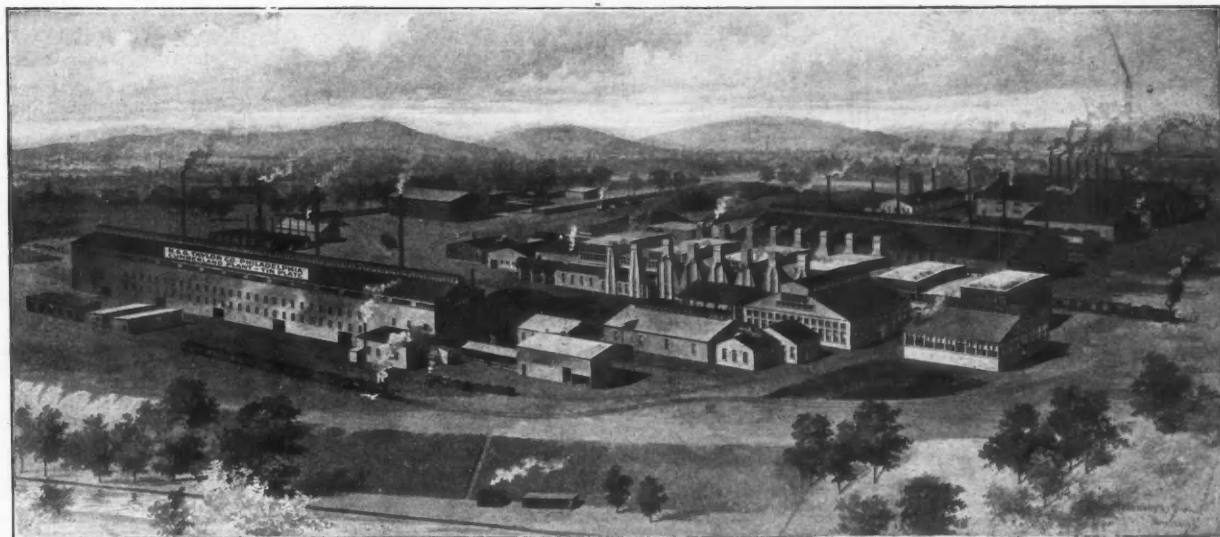
Payments, if any, shall be made on the architect's certificate. Architect's certificates shall not be considered negotiable, nor are they legal tender. When once issued the architect assumes no responsibility for their future usefulness. Partial payments shall be made as the work progresses in the amount of 85 per cent of the value of the work done as judged by the architect. In no case shall the judgment of the architect cover more than enough to pay the workmen and helpers every Saturday night. The material men must take the customary chances. The final payment, if any, shall be made when everybody is satisfied (but the contractor). Any evidence of satisfaction on the part of the contractor shall be considered a just cause for withholding final payment.

#### 9. General:

The contractor shall accept and does accept the conditions hereinbefore appearing, for himself, his ancestors and progenitors, his family, heirs, executors, his ox, his assignee and the stranger within his gates.



# The MANUFACTURER



PLANT OF N. &amp; G. TAYLOR CO., AT CUMBERLAND, MD.

## "TARGET AND ARROW" ROOFING TIN

THE development of this company's business has been an interesting one. Starting in 1810 in Philadelphia, and continuing as an importing business until the McKinley protective tariff on tin plate went into effect in 1893, it moved equipment bodily from its Welsh connections to this country. The Philadelphia plant was operated for a number of years merely as a dipping-works, on black plate, some of which was imported and some furnished by American mills. Later, the plant at Cumberland, Maryland, was purchased and practically entirely rebuilt, to include the carrying on of all tinning processes. The company's main offices continue in Philadelphia, at Chestnut and Third Streets, and stocks of finished tin plate are carried in the principal cities of the country. The business of the concern has been handed down from father to son through four generations, being now in its one hundred and tenth year.

Until 1905 the title "Taylor's Old Style" was used, but as more than three hundred imitations had appeared, such as "old style," "old method," "old process," etc., to distinguish its brand from the host of substitutes the company brought forward the name "Target and Arrow," that being the symbol which had always been a part of the old, original trade-mark always stamped on the sheets. The words "target-and-arrow" are registrable; the words "old style," being a descriptive term, are not.

This change was intended to protect the public from that form of competition which tries to substitute something cheaper under a similar sounding name, and to protect the architect by enabling him to specify clearly what is wanted, without any chance of being misunderstood. The high quality of the brand is maintained fully up to its original standard, with the experience and reputation of more than one hundred years standing back of it.

The plant consists of open hearth furnaces, rolling mills, black plate mills and tin house. Four 25-ton basic open hearth furnaces provide the supply of steel; eight hot mills with necessary

pickling machines, annealing furnaces and cold rolls, comprise the black plate department. The bar mill has a three-high roughing stand. The tin house, the most recent portion of the plant, embodies various new ideas gained from the company's long experience, and is regarded as the last word in tin house construction. This building is about one hundred by four hundred feet. It is served by a pickling department thoroughly equipped. After pickling, the sheets are carried by three 15-ton overhead cranes to tinning-stacks. This equipment includes charcoal stacks and tinning machines of many types for making heavy cokes and large tin and terne sheets up to forty inches wide, any length, and all grades of extra coated plates from twelve to fifty pounds. Here is the exclusive process known as the "full seven-open-pot palm-oil-hand-dipping stacks," by which are made the Target-and-Arrow brand roofing plates, a process transplanted bodily from Wales, continued in Philadelphia for twenty years without change, and removed complete to Cumberland.

Many accessory buildings complete the plant, boiler houses, machine shops, power houses, storage buildings, foundry and testing laboratory, and separate buildings for the safety and welfare of the workmen. Various buildings of this kind have been added in the last five years since the accompanying map was made, such as ample fire protection, dining service, and provision for recreation and community activities.

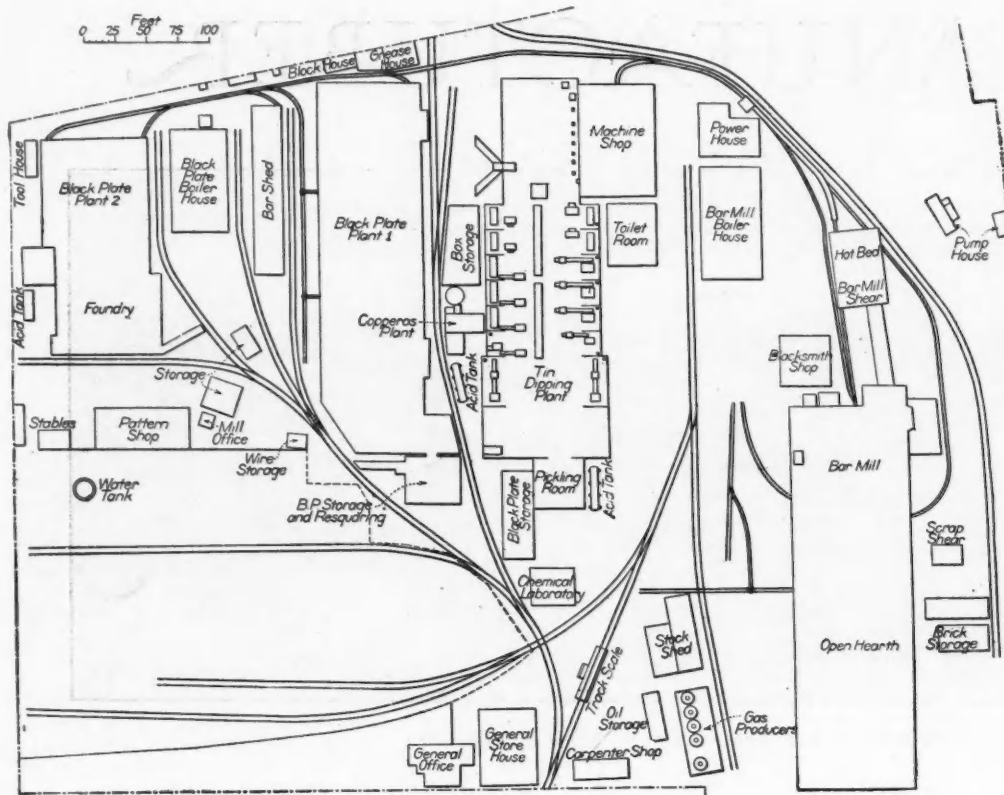
The advantages of tin roofing can be summed up briefly as follows:

It is a time-tried, long-established material, which is durable, easily applied, and adaptable to any surface, curved or irregular, flat, sloping or vertical.

Its first cost is moderate, and that of maintenance low; it is easily and quickly repaired, if damaged, and has a second-hand value for re-use.

It is neat and attractive in appearance, which loses nothing with age.

## THE BUILDING REVIEW



General Map of the Cumberland Works

It is light in weight, is not affected by extremes of climate, and gives protection against lightning, fire and weather.

It is lighter and less liable to damage than tile or slate. It is more durable and fire-resisting than shingles or gravel, slag or composition roofs. Moreover, leaks in the last named roofs are difficult to trace and repair, and are only practicable on very flat surfaces. Of course, ready-made roofing, felt and paper, is at best only a temporary covering. Copper, zinc and lead are expensive and do not have the weather-resisting qualities of tin. Attacks made against tin roofs by promoters of other materials apply only to cheap roofing plates, the inferior output of an extensive industry. Such statements are not true of the old-time heavily coated, well-made plates, which have always given such excellent satisfaction. It is difficult for the mind to grasp the statistics of the hundreds of thousands of roofs of "Target-and-Arrow," formerly "Taylor's Old Style," tin that have given complete satisfaction in all parts of this country with bona fide records of use from one hundred years ago, to the present time. In spite of exposure to sea fogs, to smoke, sparks and gas, to acid and sulphur fumes, to rain and hail and snow and use and abuse, the life of good tin as established by such records is almost incredible.

The exclusive process referred to previously may be described

briefly as follows: the sheets are placed singly on edge in a grease pan, containing hot palm oil. After about fifteen minutes they are lifted by tongs over to the "Tin Pot" containing only hot metal, and separated from the grease-pan by a partition about two inches higher than the oil.

After the sheets are thoroughly coated with molten metal, they are immersed in another pot containing hot molten metal, known as the "Soak Pot."

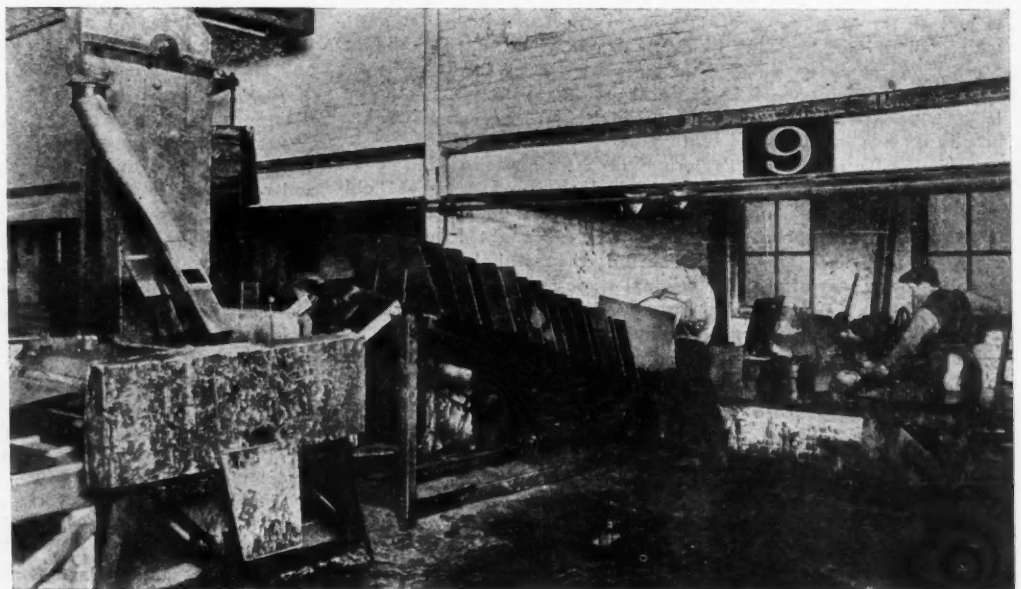
They are then placed on their side upon a flat iron table called the "Hob." There they are manipulated by the washman, and where necessary rubbed with a hemp brush; after which comes another bath in hot metal, one sheet at a time. Next comes another pot of hot palm oil, tending to distribute the metal coating evenly.

The sheets are now placed on edge in a "drain pot," to drain off the excess amount of palm oil.

Next the "lister" dips them in the list-pot, which contains about one-half inch of hot metal, for the purpose of taking off the list edge on the sheet.

This process ensures the perfect amalgamation of the three metals, and by its slow methods allows the coating to penetrate thoroughly all the pores or uneven spots of the black plate.

The following specification has been adapted for architects' use from the standard working specifications of the National Association of Sheet Metal Contractors of the United States. This represents the best practice in laying tin roofs. Architects who have not already done so, will do well to incorporate this in their regular specification forms. Good workmanship and fair treat-



Tinning Stack for Making Common Terne Plates

ment are as necessary as good material to get satisfactory results from tin roofing work; hence this specification should be enforced to the letter:

## "Tin Roofing Work":

"All tin used on this building should be (some specific) brand. No substitute for this brand will be allowed. Use IC thickness for the roof proper, decks, etc., and IX thickness for valleys, gutters and spouts, as required by design. One coat of red lead, iron oxide, metallic brown or Venetian red paint, with pure linseed oil, shall be applied to the under side of the tin before laying.

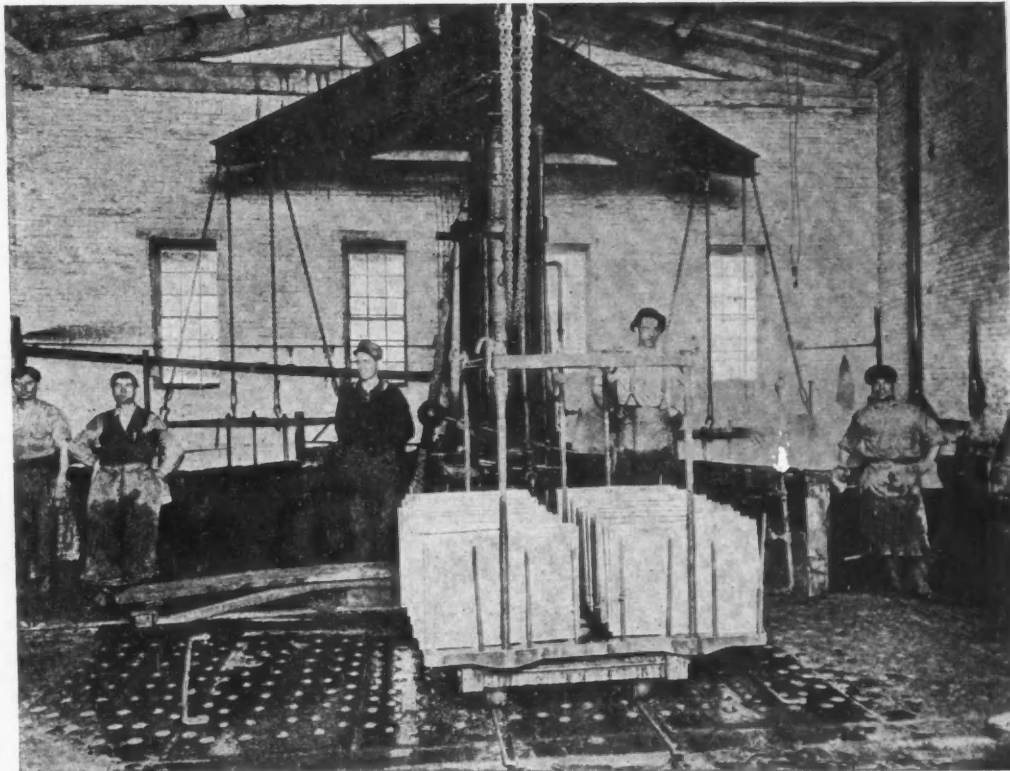
"For flat-seam roofing, edges of sheets to be turned one-half inch; all seams to be locked together and well soaked with solder. Sheets to be fastened to the sheathing boards by cleats spaced eight inches apart, cleats locked in the seams and fastened to the roof with two one-inch barbed wire nails; no nails to be driven through the sheets.

"For standing-seam roofing, sheets to be put together in long lengths in the shops, cross seams to be locked together and well soaked with solder; sheets to be made up the narrow way in the rolls and fastened to the sheathing-boards by cleats spaced one foot apart.

"Valleys and gutters to be formed with flat seams well soldered, sheets to be laid the narrow way.

"Flashings to be let into the joints of the brick or stone work, and cemented. If counterflashings are used, the lower edge of the counter-part shall be kept at least three inches above the roof.

"Solder to be of the best grade, bearing the manufacturer's



Mesta Low Type Pickler in the Tin House

name, and guaranteed one-half tin and one-half lead, new metals. Use rosin only as a flux.

"Caution.—No unnecessary walking over the tin roof or using same for storage of material shall be allowed. In walking on the tin care must be taken not to damage the paint or break the coating of the tin. Rubber-soled shoes or overshoes should be worn by the men on the roof.

"Painting Tin Work.—All painting of the tin work to be done by the roofer, using red lead, iron oxide, metallic brown, or Venetian red paint, with pure linseed oil—no patent dryer or turpentine to be used.

"All paints to be applied with a hand-brush, and well rubbed on. Tin to be painted immediately after laying. A second coat shall be applied in a similar manner, two weeks later.

"No deviations from these specifications shall be made unless authority is given in writing by the architect. Only a first-class roof will be accepted."

The company publishes a breezy, instructive little magazine, "The Arrow," now in its sixteenth year of issue, which is sent quarterly to architects and draftsmen, any of whom may be added to the mailing list by his own request. The agency in San Francisco for N. & G. Taylor Company, both roofing and tin covering for fire doors and other purposes, is held by J. A. Drummond, 245 Mission Street.



The Tin House from North End. The Tinning-Stacks Are Located in the Recesses on Either Side



# REFERENCE INDEX OF ADVERTISERS

Containing List of Manufacturers, Their Representatives and Useful Literature

## ASBESTOS BUILDING LUMBER

**Kearney & Mattison Co.,** Ambler, Pa.  
**J. A. Drummond,** 245 Mission Street, San Francisco, Cal.  
 Illustrated and descriptive pamphlet, 7½x10½, 8 pp. Pamphlet, 4x8½, 8 pp. Price list, 3½x6¼. Literature of various sizes, samples, etc. "Service Sheets," working drawings, details of application, size 16½x21½.

## ASBESTOS CORRUGATED SHEETING

**Kearney & Mattison Co.,** Ambler, Pa.  
**J. A. Drummond,** 245 Mission Street, San Francisco, Cal.  
 Descriptive catalogue, 5¼x8¼, 24 pp. Catalogue of details and specifications for application of roofing and siding, size 8½x11, 40 pp. Lists of buildings covered. Price lists, 3½x6¼, 6 pp., and literature of various sizes, samples, etc. "Service Sheets," working drawings, details of application, size 16½x21½.

## ASBESTOS SHINGLES

**Kearney & Mattison Co.,** Ambler, Pa.  
**J. A. Drummond,** 245 Mission Street, San Francisco, Cal.  
 Illustrated catalogue. Detail specifications, 8x10, 20 pp. Descriptive catalogue, various types of roof covering, 5¼x8¼. Various pamphlets, 3½x6. Current price lists, 3½x6¼, 6 pp. Lists of buildings and literature, various sizes, samples, etc. "Service Sheets," working drawings. Detail of application, size 16½x21½.

## BARS, REINFORCING

**Pacific Coast Steel Co.,** Rialto Building, San Francisco, Cal.  
 Square, round and corrugated.

## BRICK, FIRE AND REFRACTORIES

**Gladling, McBean & Company,** Crocker Bldg., San Francisco, Cal.  
**Simons Brick Company,** 125 West Third Street, Los Angeles, Cal.

## BRICK, PRESSED

**Gladling, McBean & Company,** Crocker Bldg., San Francisco, Cal.  
**Simons Brick Company,** 125 West Third Street, Los Angeles, Cal.

## CEMENT, PORTLAND

**Santa Cruz Portland Cement Co.,** Crocker Bldg., San Francisco.  
**Standard Portland Cement Co.,** Crocker Bldg., San Francisco, Cal.  
 Bulletin, 12 pp. Size 6x9; also furnish bulletins and specifications for various classes of work requiring Portland Cement.  
**Henry Cowell Lime and Cement Co.,** 2 Market St., San Francisco.  
**Cowell Portland Cement Co.,** Cowell, Cal.  
 Mt. Diablo Brand especially adapted for cementing oil wells. Literature and pamphlet supplies on request as furnished by the Portland Cement Association.

## COLD STORAGE INSULATION

**Van Fleet-Freear Co.,** 120 Jessie Street, San Francisco, Cal.  
 Illustrated catalogues, etc.

## CONTRACTOR'S ASSOCIATIONS

**Building Industries Association,** 110 Jessie St., San Francisco.  
**General Contractors Association,** Sharon Building, San Francisco.

## CORK FLOOR

**Van Fleet-Freear Co.,** 120 Jessie Street, San Francisco, Cal.  
 Illustrated catalogues, etc.

## ELECTRICAL EQUIPMENT

**Kearney & Mattison Co.,** Ambler, Pa.  
**J. A. Drummond,** 245 Mission Street, San Francisco, Cal.  
 Descriptive Pamphlet, 3½x6, 12 pp. Descriptive, 4x8½, 8 pp. "Service Sheets" working drawings. Detail of application, 16½x21½.

## ELEVATORS

**Otis Elevator Co.,** Eleventh Avenue and 26th Street, New York.  
**Otis Elevator Co.,** 2300 Stockton Street, San Francisco, Cal.  
 Offices in all principal Coast cities. Otis Electric Traction Elevators. Bulletin, 6x9, 28 pp.

## ESCALATORS

**Otis Elevator Co.,** Eleventh Avenue and 26th Street, New York.  
**Otis Elevator Co.,** 2300 Stockton Street, San Francisco, Cal.  
 Offices in all principal Coast cities. Otis Escalators. Bulletin, 6x9, 36 pp.

## GLASS

**W. P. Fuller & Co.,** Principal Coast cities.  
 Plate, Sheet and Mirror Lists. Glass Samples.  
**Kearney & Mattison Co.,** Ambler, Pa.  
**J. A. Drummond,** 245 Mission Street, San Francisco, Cal., Pacific Coast representative CORRUGATED WIRE GLASS for skylight construction (without housings), used in connection with Asbestos Corrugated Sheeting. Catalogue of details, 8½x11, 40 pp.

## IRONING BOARDS

**National Mill & Lumber Co.,** 318 Market Street, San Francisco, Cal.  
 Pamphlet, 3½x6¼, 4 pp.

## LANDSCAPE ENGINEERS

**MacRorie-McLaren Co.,** 141 Powell Street, San Francisco, Cal.  
 Descriptive catalogue, 5x8¼, 52 pp.

## LIGHTING EQUIPMENT

**The Reflectolyte Co.,** 914 Pine Street, St. Louis, Mo.  
**J. A. Drummond,** 245 Mission Street, San Francisco, Cal.  
 Reflectolyte, containing specifications, illustrations and engineering data for superior indirect illumination. 7½x10½, 24 pp. Folder, 3½x6¼, illustrating the Junior Reflectolyte for inexpensive installation.

## LIME

**Henry Cowell Lime and Cement Co.,** 2 Market Street, San Francisco, Cal.

## MILL WORK

**National Mill & Lumber Co.,** 318 Market Street, San Francisco, Cal.  
 Catalogue of Moulding Columns, Doors and General Mill Work, 7x10, 94 pp.

## PAINTS, ENAMELS AND WOOD FINISHES

**Berry Bros.,** Wight and Leibe Streets, Detroit, Mich.  
**Berry Bros.,** 250 First Street, San Francisco, Cal.  
 Natural Woods and How to Finish Them. Complete varnish specifications. 4¼x6½, 94 pp.  
 Luxeberry Cement Coating. Color card, 3½x8½, 3 pp.  
 Architectural Finishes. Illustrated.  
**Boston Varnish Co.,** Everett Station, Boston.  
**San Francisco Office, A. L. Greene, Mgr.,** 269 Eighth Street.  
 Kyanize Enamel. Complete specifications. Booklet, 5x7, 20 pp.  
 Kyanize White Enamel. Directions. Circular, 3½x6, 8 pp.  
 Recent Pacific Coast Architecture. Illustrated.  
 The Inviting Home. Illustrated.  
 Price List of Varnishes and Enamels. 3½x6, 24 pp.  
**W. P. Fuller & Co.,** Principal Coast cities.  
 Paints and Varnish specifications. 14-page booklet.  
 Pertinent Facts on Paints and Painting. 14-page booklet.  
 Color cards and descriptive circulars on: House Paints, Floor, Porch and special paints for all purposes.  
 Silkenwhite Enamel, Tinted Panels, and descriptive matter, Wall Finishes and Kalsomine. 20-page booklet.  
 Decorator's Sample Books.  
**R. N. Nason & Co.,** 151 Potrero Avenue, San Francisco, Cal.  
 Catalogues, literature and color cards.  
**Standard Varnish Works,** New York and San Francisco.  
 Architectural Specifications.  
 How to Finish Floor. Booklets.  
 Satinette Enamel. Booklets.  
 How to Finish Stained and Natural Woods.  
 Klenstone Stain Reproductions.  
 Makes the World Grow Brighter. Pamphlets.  
**Wadsworth, Howland & Co., Inc.,** 139 Federal Street, Boston.  
**San Francisco Office, James Hamby & Sons,** 268 Market Street, Francisco, Cal.  
 Bay State Brick and Cement Coating. Catalogue, 4x9, 24 pp.  
 Color plates.  
 Bay State Finishes, Stains, and Varnishes. Pamphlets. Color cards, etc.  
**Los Angeles Office,** 447-449 E. Third Street, Los Angeles, Cal.

## PLUMBING EQUIPMENT

**Pacific Sanitary Mfg. Co.,** 67 New Montgomery Street, San Francisco, Cal.  
**Northern Manager, H. L. Frank,** 80 Front Street, Portland, Ore.  
**T. A. Williams,** Scott Building, Salt Lake City, Utah.  
 General catalogue "C," 6½x9, 176 pp. Indexed.  
 School Sanitation Book, 6x9, 32 pp.  
 Export Catalogue "E," 6x9, 160 pp.  
 Book of Bath Rooms (for clients), 6x9, 56 pp.  
**Standard Sanitary Manufacturing Co.,** San Francisco Warehouse, Display Rooms and Offices, 149 Bluxome Street.  
**Los Angeles Warehouse, Display Rooms, Offices,** 216-224 South Central.  
**Seattle,** 5300 Wallingford Avenue.  
 General Catalogue "P," 9x12, 674 pp. General Catalogue "PF," 9x12, 329 pp. Factory Sanitation Catalogue, 9x12, 36 pp. Built-in Bath, 9x12, 37 pp. Pottery Catalogue Sanitary Earthenware, 9x12, 38 pp. Shower Booklet, 3½x6, 19 pp. Efficiency Kitchen Book—Modern Kitchen Equipment, 5x7, 15 pp. Plumbing Fixtures for the Home, 5x7¼, 63 pp.

## PIPE, WOOD

**Pacific Tank & Pipe Co.,** 318 Market Street, San Francisco, Cal.  
 Catalogue of wood pipe and tanks for all purposes. 4x8¼, 40 pp.

## PORTABLE HOUSES

**National Mill & Lumber Co.,** 318 Market Street, San Francisco, Cal.  
 Catalogue Treatise on Portable House. Suitable for any location. Size 4x9, 12 pp.

Cal.

gi-  
0 1/2,  
cto-

ran-

Cal.  
Mill

nish

5x7,  
p.

et.  
ints,  
tter,

reet,  
4 pp.  
Color  
al.

ran-  
Ore.

3lux-  
South

logue  
9x12,  
logue  
oklet,  
tchen  
the

Cal.  
ix8 3/4,

, Cal.  
y lo-